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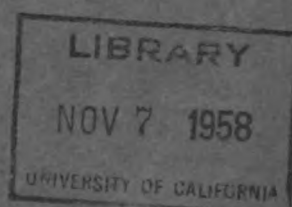
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ERNEST JONES

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THE INTERNATIONAL PSYCHO-ANALYTICAL PRESS

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THE CAUSAL FACTORS OF JUVENILE CRIME.

BY CYRIL BURT.

SOURCES OF DATA.

(1) *Delinquent Groups.*

I PROPOSE to present, chiefly by a series of tables, a preliminary analysis of the causation of juvenile delinquency. The children and young persons, guilty of criminal conduct and examined for this research, fall into three broad groups: first, cases referred to me for investigation by magistrates, organisers of children's care, head-teachers, parents, and secretaries of associations dealing with juvenile delinquents; secondly, a somewhat smaller group encountered in an educational survey of a representative borough¹; thirdly, a still smaller selection, studied during occasional visits to remand-homes or industrial schools, when recent entrants and representative samples were specially tested and reviewed.

A psychologist is always apt to receive an undue proportion of cases where the issue is not simply the cause of delinquency, but rather the determination of mental subnormality. Accordingly, I have endeavoured

¹ This survey had for its primary object an enquiry into the distribution of intelligence, with special reference to the incidence of backwardness and mental deficiency; but a watch was also kept for cases of delinquency and so-called moral defect. The proportion of delinquents thus discovered among the general school population was, for boys, 0.9 per cent., and, for girls, 0.6 per cent. But these figures comprise for the most part only the graver cases known to head teachers; and, therefore, particularly among the boys, must form a gross under-estimate. To the few thus ascertained must be added the many whose delinquencies are known to none but their parents, and the still greater number, whose delinquencies are never detected until later in life, or, being perhaps transitory, remain for ever unknown except to themselves. For the type of offences here contemplated and during the ages here reviewed, the proportion of occasional delinquents, among the total population for the same years, cannot be less than 5 per cent. for girls, nor less than 10 per cent. for boys and youths. But, by pressing the definitions for such offences as the infringement of police regulations or for such delinquencies as those connected with sex, and by including isolated petty thefts at home, one could expand the percentage up to any magnitude below one hundred.

to eliminate from the statistical analysis all children notified solely for psychological diagnosis; and, among the submitted cases, have retained only those sent to me either as a matter of routine or for general advice upon treatment. In the three groups investigated, the proportional incidence of the several causative factors proves to be approximately the same; and I am disposed, therefore, to infer that the whole series forms a fairly typical selection of delinquent children and young persons.

The total number comprises 123 boys and 74 girls, approximately two hundred cases in all. Since I have limited my analysis solely to those instances in which I have procured full evidence for all the conditions reviewed—family history, personal history, physical characteristics, and psychological characteristics—the numbers are inevitably slender. The average age of the individuals dealt with is 12.6 years for the boys; and slightly higher, namely 13.1 years, for the girls. The entire series ranges from 18.0 years, the age at which industrial school cases cease to be under the supervision of the managers, down to 7.0 for the girls, and 5.0 for the boys. Just over half of the cases, however, fall within the years 12- to 15-. Their distribution over the various age-groups is shown in Table I.

The offences committed by these children are of the usual type: stealing, truancy, wandering, damage, common assault, indecent assault, soliciting, or being beyond parental control. Of the nature and number of delinquencies I have given a detailed description elsewhere¹.

TABLE I. *Distribution of Ages.*

Age last birthday	5-	6-	7-	8-	9-	10-	11-	12-	13-	14-	15-	16-	17-	Total
Percentage of boys in each age-group	4.1	3.3	4.1	4.9	5.7	5.7	9.0	10.6	12.2	14.6	16.3	6.5	3.3	100
Percentage of girls in each age-group	—	—	2.7	6.8	9.5	8.1	5.4	13.5	12.2	10.8	14.9	9.5	6.8	100

(2) *Control-Groups.*

General considerations suggest, and my investigations into other forms of mental subnormality strongly confirm, the supreme necessity in all such studies of a parallel inquiry among relatively normal individuals. To state, for example, that 19 per cent. of one's cases come from

¹ *Psyche*, Vol. II, No. 4, pp. 342-3, Table I, where the figures given refer to the same groups as are here described. It should be remarked that, in addition to the crimes punishable in an adult by penal servitude or imprisonment, there are certain other offences which only children can commit—notably non-attendance at day schools and being beyond parental control.

drunken or vicious homes¹, or that 8 per cent. are mentally backward and subnormal², or that 4 per cent. have no parents at all³, means nothing, until one has assessed the frequency of drunken or vicious homes, of backwardness, and of orphanhood among the general law-abiding population. A control-group is essential. To this end I have endeavoured to make identical studies of children of the same age and of the same social class, who may be regarded as morally normal. In the tables below I have added throughout percentages for these parallel cases⁴. In compiling such figures I have made use chiefly of case-histories got during two separate surveys—an investigation into the causes of backwardness, and a later enquiry upon the possibility of vocational guidance. In order that the age-distribution should be precisely the same, it has been further necessary to make a special examination of a few additional individuals, chiefly infants under seven and young persons over school age. In all I have taken 200 non-delinquent boys and 200 non-delinquent girls, carefully selecting them so that the percentages in the several age-groups and the proportions in the several social classes should be identical with those obtaining among the delinquents. The non-delinquents have all been tested, medically inspected, and reported upon by teachers, by parents, and by social investigators, according to the same general scheme⁵.

To gain trustworthy data upon the temperamental qualities of four hundred children would, it was found, consume an impracticable deal of time. Such observations as were furnished by parents or teachers differed widely in their fulness, in their accuracy, and in the standards upon which

¹ W. Healy, *The Individual Delinquent*, p. 134. Although in what follows I comment from time to time on slight divergences from the views of this writer, it is impossible to mention his model investigation—so unlike the innumerable surveys that preceded it—without a tribute of gratitude and esteem to a work so admirably thorough upon a subject so incredibly complex.

² *Ibid.*, p. 131.

³ W. D. Morrison, *The Young Offender*, p. 134.

⁴ A similar procedure has been adopted by me in the study of the causes of backwardness in school children. See *Report of an Investigation upon Backward Children in Birmingham*, City of Birmingham Stationery Department, 1921.

⁵ For a few special medical examinations both of delinquent and non-delinquent cases I have been indebted to Dr Jessie Murray and to my sister Dr Marion Burt. I am also under a special obligation to the physicians and medical registrars of various hospitals, through which several of my cases have passed, for their kindness in granting me detailed notes of conditions observed.

I should add that my plan of study and my schedule or 'psychographic scheme' are, in their main outlines, the same for the delinquent as for the backward and the defective; they were, indeed, based upon those originally elaborated for the latter. Comparability has thus become easier to secure, and, I hope, safer to rely upon.

they were based. With the delinquents the more important facts respecting temperamental constitution were gathered, not from the first statements of the teachers, parents, or care committee visitors (though these were often invaluable), but from long intercourse with the children themselves, during out-of-school hours, in simple but varied social situations. Accordingly, for comparison a similar approach was sought to one hundred of the normal boys and fifty of the normal girls. For example, when calling upon, or offering an invitation to, one of the delinquent children, a second call or invitation was extended to a non-delinquent child of the same age and of the same school, dwelling, as a rule, in the same locality and street. Comparable pairs were thus studied side by side¹. No attempt, however, was made to ascertain the working of psycho-analytic mechanisms among the control-groups, since this would have entailed an indefinite number of interviews with each child singly.

Such a twofold enquiry renders the whole procedure slow, and restricts the inferences drawn to a small and limited group. On the other hand, could all investigators adopt the same principle and pursue the same method, trustworthy results and tenable conclusions would be speedily achieved. Where, for instance, the assessment of certain factors is necessarily a matter of subjective impression—as in such vague conditions as alcoholism, poverty, and temperamental qualities—the percentages for the control-groups immediately afford a clue as to how the investigator is interpreting his terms. And, in the absence of any such control-enquiry, what is actually a characteristic of the general population, may be wrongly mistaken for a peculiarity of the criminal.

TABULATION OF DATA.

The conditions observed in both delinquent and non-delinquent groups are tabulated in detail in Tables V to VIII. The descriptions

¹ By repeated interviews I have made myself personally acquainted with every one of the 347 children in question. I am also indebted to many voluntary collaborators who have helped me, often at considerable cost of time and money to themselves, along similar lines; more particularly to Miss V. G. Pelling, Miss W. Charles, Miss D. Miller, Miss P. Woursell, Miss J. Kenwick, Mr Eric Farmer, and Mr Raisley Moorsom; and to a group of residents and workers associated with the Passmore Edwards Settlement. To head-teachers and to class-teachers, to organisers and visitors for children's care committees, my obligations are too numerous to specify. To Miss M. Alston and to Mr F. R. Hoare I am especially grateful for reports and detailed after-histories of children examined by me for the Sysonby Colony for Juvenile Delinquents; and to Miss Rawlinson, welfare-worker for the Committee for the Moral Welfare of Children (Islington and Finsbury), for similar notes upon others of my cases that have passed through her hands.

employed for the most part explain themselves¹. The figures are shown in the form of percentages: and indicate the number of times the item specified was observed per hundred cases. The averages given for the delinquents are weighted averages, that is, they are based upon the total number of cases taken regardless of sex, not upon the simple arithmetic mean of the two percentages for boys and girls.

It will be at once perceived that an immense variety of adverse influences may, in a larger or smaller measure, provoke or pre-dispose to delinquency in children. In all, over 170 distinct conditions have been encountered, and are enumerated in the tables, every one of them likely to affect the child unfavourably. Seventy different conditions have been noted as forming, in one instance or another, the principal cause of a given child's criminality.

Thus, at the very outset, in studying delinquency, as in most other fields of individual psychology, we are confronted with the fact of multiple determination. Crime in any given person proves nearly always attributable, not to some single all-pervading cause, but to a converging multitude of alternative factors; and the nature of these factors, and of their varying combinations, may differ widely in different individuals.

DISTINCTION OF MAJOR AND MINOR FACTORS.

Amid all the tangle of contributory causes, some single condition not infrequently stands out as the most prominent or the most influential². Often it can be definitely established that the individual in question showed no delinquent tendencies until the year of some unfortunate event. An illness, a friendship with some base acquaintance, the death or the re-marriage of a parent, the emergence within the growing child himself of some fresh interest or instinct—some dated crisis of this kind has often ascertainably preceded, and has perhaps plainly provoked, the first delinquent outburst. At times, with the same abruptness, so soon

¹ Some, it is true, are extremely vague. But in a brief preliminary review it seemed hardly worth while to define or discuss each condition at length. For the vaguest of all—the psychological factors—a fuller explanation will be found in a series of more popular articles recently published on "The Causes and Treatment of Juvenile Delinquency," *Psyche*, Vol. II, Nos. 3 and 4, and Vol. III, No. 1.

² This seems to have been the experience of other investigators; see e.g. Healy, *The Individual Delinquent*, p. 162. We ourselves started with a fourfold classification of factors: (1) the principal or most conspicuous influence (if any); (2) the chief cooperating factor or factors; (3) minor predisposing or aggravating conditions; (4) conditions present but apparently inoperative. This subdivision, however, proved too elaborate for so small an array of cases; and, for the present preliminary account, it has seemed advisable to reduce the classification to the simpler twofold distinction as above described.

as the untoward condition has been removed, the child's misbehaviour has diminished and his outbreaks have ceased. In other instances some salient quality of the child's mind, existing from birth or inherited from his parents, at once explains the misconduct: a strong sex instinct, a weak and suggestible temper, or a general deficiency of intelligence. But in many cases to discover any one predominating factor is a more doubtful and precarious business. Here, to reduce the effect of personal preconceptions, each individual child has been discussed with other investigators who had equally a first-hand knowledge of his case; and an opinion has been passed only when an agreement has been attained. In a few rare instances, two or more factors seem to have exercised an influence that was almost equal; neither element alone, it would appear, could have precipitated the delinquency: it is the mutual reaction of the two which, by a kind of psychological chemistry, has generated the ultimate explosion. In such an event I have allowed the same weight to both cooperating factors by counting the equivalent of half a case to each. Last of all, there remains a distinct proportion, which, whether from the nature of the circumstances, or from the incompleteness of the analysis, have baffled all efforts at assigning any paramount factor. These last have been recorded under a separate heading of their own. In the rest of the cases the contributory causes have been separated into major factors and minor.

A summary of the numerous conditions, classified under fifteen heads, is shown in Table II. Major factors seemed discernible in about 95 per cent. of the cases, leaving about 5 per cent. (rather less in the case of the girls) with the major factor undetected or unassigned. In addition, subordinate factors¹ were recorded about 900 times per hundred cases—rather more with the girls, rather less with the boys. On an average, therefore, each delinquent child is the product of nine or ten adverse circumstances, one as a rule predominating, and all conspiring to draw him into crime.

The type of condition noted, however, is by no means peculiar to delinquent families. The same circumstances were observed in the non-delinquent cases 300 times per cent.² Thus, in children of the same social class similar conditions may coexist—on an average, about 3 per case—

¹ Many of these are, of course, but aspects or consequences of other factors; thus the death of the father may lead to poverty, weak discipline, re-marriage of the mother, and a step-father complex with two or three different elements, all separately enumerated in the tables. In this section of the text, hereditary conditions, existing in the parents and relatives, have not been reckoned as additional to the corresponding condition in the child.

² This figure does not include complexes, which were left unexplored in the control-group.

TABLE II. *Summary of Conditions.*

	Delinquent					Non-delinquent		
	Boys		Girls		Av.			
	Major factor	Minor factor	Major factor	Minor factor		Boys	Girls	Av.
<i>I. Hereditary conditions:</i>								
A. Physical	2.4	48.9	4.2	51.5	53.1	30.5	33.2	31.8
B. Intellectual	4.0	34.2	1.4	30.1	35.6	8.5	8.0	8.2
C. Temperamental (with pathological symptoms)	11.3	26.1	15.0	35.4	42.2	24.0	15.5	19.7
D. Temperamental (with moral symptoms)	8.8	117.1	12.4	168.0	145.9	32.5	41.5	37.0
Total	26.5	226.3	33.0	285.0	276.8	95.5	98.2	96.7
<i>II. Environmental conditions:</i>								
<i>A. Within the home:</i>								
1. Poverty	3.2	82.2	—	78.4	82.5	78.5	74.0	[51.2] ¹
2. Defective family relationships	5.7	111.4	12.3	143.5	131.3	38.0	32.5	35.2
3. Defective discipline	8.9	82.9	8.2	51.7	79.5	12.0	11.0	11.5
4. Vicious home	3.2	39.8	7.0	70.4	55.5	10.0	9.5	9.7
<i>B. Outside the home</i>	8.9	54.6	5.5	46.1	59.7	22.0	19.5	20.7
Total	29.9	370.9	33.0	390.1	408.5	160.5	146.5	128.3
<i>III. Physical conditions:</i>								
Total	11.2	135.9	9.6	176.3	160.8	79.5	101.5	90.5
<i>IV. Psychological conditions:</i>								
A. Intellectual	11.4	61.0	6.8	54.1	62.8	25.0	24.5	24.7
<i>B. Emotional:</i>								
1. General	13.0	43.2	17.6	52.8	61.2	12.5	23.0	17.7
2. Specific	10.5	94.5	12.3	78.7	99.5	23.5	16.0	19.7
3. Interests	7.3	56.9	4.2	37.8	55.7	16.0	14.5	15.2
4. Complexes	11.2	128.3	13.7	162.9	152.6	—	—	—
Total	53.4	383.9	54.6	386.3	431.8	77.0	78.0	77.5
No major factor assignable	5.5	—	2.8	—	—	—	—	—
Grand total (II, III and IV only ²)	100.0	890.7	100.0	952.7	1001.1	317.0	326.0	296.3

¹ See footnotes (1) and (*) to Table VI.² Hereditary conditions, enumerated under I as occurring in the family history, have not been included in the grand totals, since presumably they have already been reckoned, as occurring in the children themselves, in headings II, III and IV.

without plunging the child into a criminal career. It must, as a rule, therefore, be either the number of factors or the particular combination of them, that renders delinquency a probable result.

ERRORS OF SAMPLING.

With groups and group-differences so small as those here studied, it is needful to bear always in mind the degree of error which the narrow range of cases inevitably permits. Consider, as an illustrative instance, the effect of a sexually immoral home upon boys and girls respectively. Among the delinquent girls there were six living under such conditions; among the delinquent boys there were only three—half the number in a group nearly twice the size. Is this difference significant? May we validly deduce from it that an immoral mother contaminates her daughters more than she corrupts her sons? Or may the slight divergence of figures be, after all, nothing but a chance fluctuation due to the small numbers thus compared? The point can be settled by a simple statistical check. Computed by the customary formula¹, the standard error of sampling for the difference observed proves to be 3.5. The difference between the two percentages is itself $2.4 \sim 8.2 = 5.8$ —less than twice the sampling error. Accordingly, it is highly possible that a difference relatively so slight might have arisen by pure accident. When, however, we turn to the larger groups, and compare the percentage for the entire set of delinquents (4.6) with that for the entire set of non-delinquents (0.25), the sampling error, in virtue of the larger numbers, now sinks to 1.5; the difference observed is almost three times this figure. Here, therefore, there is little danger that we may be dealing with some accidental discrepancy; and it becomes legitimate to infer that an immoral home definitely favours crime.

I shall not burden the reader with a “probable error” for each isolated figure. Where the statistical precisian requires it, the margin for inaccuracy due to sampling can be roughly gauged from the abbreviated table below (Table III). It will be seen that, in comparing the main groups of delinquents and non-delinquents, the differences in the body of the table can seldom be significant, unless the one percentage is three or four times the size of the other; in the totals, an addition of about half as much again may be suggestive. Thus, pairs like 0.5 and 5.0, 2 and 8, 6 and 14, 24 and 36, begin to indicate a genuine difference. In comparing the smaller groups, however—for example, the delinquent boys with the delinquent girls—little weight can be attached to the numerical differences, without further argument in their support.

¹ G. Udny Yule, *Introduction to the Theory of Statistics* (2nd ed.), p. 269.

TABLE III. *Standard Errors of Differences.*

Groups compared	Number in groups	Percentages in the neighbourhood of					
		1	3	5	10	20	30 %
All delinquents	197 }	0.9	1.5	1.9	2.6	3.5	4.0
Large control-group	400 }						
All delinquents	197 }	1.1	1.8	2.3	3.2	4.3	4.9
Small control-group	150 }						
Delinquent boys	123 }	1.1	2.0	2.5	3.4	4.6	5.3
Large control-group for boys	200 }						
Delinquent boys	123 }	1.5	2.5	3.2	4.4	5.9	6.7
Delinquent girls	74 }						
Delinquent girls	74 }	1.8	3.1	4.0	5.5	7.3	8.4
Small control-group for girls	50 }						

GENERAL CONCLUSIONS.

In this brief review, with data so slight and cases so meagre, I shall not venture to examine in concrete detail the mode and the direction in which every traceable condition may be presumed to have exercised its influence. My purpose is simply to submit a first preliminary survey; to emphasise the complexity of the problem and the variety of the issues; and to criticise one or two of the sweeping generalisations still current, for which the data here brought forward may be expected to supply some rough and tentative test.

The final upshot of my analysis is shown in numerical form in Table IV. The figures measure the degree of association between juvenile delinquency on the one hand, and the various types of condition observed, on the other¹. With the loose data inevitable in sociological enquiries, statistical coefficients must not be too zealously pressed. Broadly speaking, however, the averages suggest the following deductions. All the conditions enumerated in the table are positively correlated with delinquency; but none to a very high degree. Extrinsic or environmental conditions, and intrinsic or psychological conditions, have about equal influence. Of psychological conditions the intellectual are rather less important than the emotional. Of environmental conditions those obtaining outside the home are far less important than those obtaining within it; and within it, material conditions such as poverty, are far less important than moral conditions such as ill discipline and vice. Physical conditions have roughly but half the weight of psychological and en-

¹ For the value in psychology of the coefficient of association, and for the formula used, I may refer to Appendix II of my book on *Mental and Scholastic Tests*. As with the coefficient of correlation, unity indicates complete interdependence; and zero, absence of all connection.

TABLE IV. *Coefficients of Association between Delinquency and Conditions Observed.*

						In relatives generally	In parents only
I. <i>Hereditary conditions:</i>							
A.	Physical	...	...	...	...	.13	.22
B.	Intellectual	...	...	...	...	.36	.44
C.	Temperamental (with pathological symptoms)	...	...	...	...	.19	.26
D.	Temperamental (with moral symptoms)	...	...	...	...	.33	.37
	Average	...	...	...	...	.25	.32
II. <i>Environmental conditions:</i>							
A. Within the home:							
1.	Poverty	...	...	...	...		.14*
2.	Defective family relationships	...	...	...	...		.34
3.	Defective discipline	...	...	...	...		.46
4.	Vicious home	...	...	...	...		.42
B.	Outside the home	...	...	...	...		.26
	Average	...	...	...	...		.32
III.	<i>Physical conditions</i>	...	...	...	...		.16
IV. <i>Psychological conditions:</i>							
A.	Intellectual	...	...	...	...		.25
B. Emotional:							
1.	General	...	...	...	...		.31
2.	Specific	...	...	...	...		.40
3.	Interests	...	...	...	...		.28
	Average	...	...	...	...		.31

* In calculating this coefficient the percentage used for the control-group is that for the amount of poverty obtaining in the general London population, not the 200 non-delinquents. See Table VI, footnote (1).

vironmental; and, while hereditary factors might seem to bear the same importance as these two latter, it is not certain, without further data and discussion, that the influence of an inheritable condition works through inheritance only, and not also through the environmental situations and psychological reactions which it may incidentally set up.

In the following pages I shall briefly comment on the effect of these several factors, one by one, and examine the evidence of the detailed tables as succinctly as I can.

I. HEREDITARY FACTORS.

Whether there is such a being as a born delinquent, and whether criminality as such may be inherited, have for long been favourite topics of dispute among criminologists. For the psychologist they seem already to have passed into the region of those speculative questions which the

popular theorist loves to propound, but which the scientific investigator hesitates to answer, not merely because his evidence is insufficient, but because the alternatives implied are not to his mind entirely exclusive. A sharp and absolute distinction between what is instinctive and what is acquired can in psychology no longer be sustained. Nevertheless, the issue is by no means purely fanciful and abstract. It receives an eminently practical bearing from the introduction into the Mental Deficiency Act of the concept of "moral imbecility." The definition of the "moral imbecile," or at least the construction put upon that definition by many magistrates and certifying officers, plainly assumes that vicious and criminal propensities may be innate, and so beyond all hope of training or cure¹.

Upon the supposed hereditary nature of what may be termed "the criminal diathesis," the figures in Table V may be expected to throw some light. The headings contain a list of all the characteristics recorded of the delinquent's family, which might be supposed to be inheritable, and at the same time to have disposed him towards the commission of crime².

¹ The ablest exposition of this clause—a clause, it would seem, which is now felt to be satisfactory by no psychological writer—will be found in Dr Tredgold's admirable textbook on *Mental Deficiency*: consult, more particularly, his discussions both of "primary moral deficiency" (2nd ed., p. 320, where he cites the figures of Gruhle, discussed below) and of the "habitual criminal type" (*loc. cit.* p. 326, where, accepting with some modification the views originated by Lombroso, and popularised in this country by Maudsley and Havelock Ellis, he aims at a more exact description of the moral defective: "They commit crimes," he says, "not because they are deficient in will or are passionate and excitable, but because they are either possessed of ineradicable anti-social propensities, or really cannot appreciate the difference between right and wrong. They are, in fact, fundamentally lacking in moral sense, and this...causes them to be absolutely irreformable. The condition is in-born"). See also the same writer's lucid article on "Moral Defectives" in *Studies in Mental Inefficiency*.

I myself have argued that, whatever interpretation be put upon the phrase "mental defect" in the clause in question, whether it implies only defect of intelligence or may cautiously be taken to include temperamental deficiency as well, all so-called "moral imbeciles" would seem to be certifiable under the clause dealing with the so-called "feeble-minded"; and, in any case, a diagnosis of "moral imbecility" should only be made, if ever, in the most exceptional cases and with the utmost circumspection (*Studies in Mental Inefficiency*, i. iii. p. 51 and iv. pp. 69 *et seq.*).

² The condition has been recorded as a major factor only when it appeared to have been transmitted to the child directly, in the same or in some closely allied form, and then to have contributed to his delinquency as the predominating cause. In these instances, and in these instances alone, the major factor has been entered twice, first in a table for hereditary factors as a peculiarity of the parent or relative, and secondly in one of the later tables as a peculiarity of the child himself. The letter 'f' denotes that the condition was observed or reported of the father, 'm' of the mother, 'r' of relatives of a remoter degree—among whom, however, I have included only brothers and sisters, uncles and aunts, and

TABLE V. I. *Hereditary Conditions.*

		Delinquent					Non-delinquent		
		Boys		Girls		Av.			
		Major factor	Minor factor	Major factor	Minor factor		Boys	Girls	Av.
A. Physical:									
Tuberculosis	f.	—	3.3	—	5.4	4.1	2.5	5.0	3.7
	m.	—	4.1	—	2.7	3.5	4.0	3.0	3.5
	r.	—	10.6	—	16.2	12.7	13.0	10.0	11.5
Rheumatism	f.	—	3.3	—	4.1	3.5	1.5	0.5	1.0
	m.	0.8	7.3	1.4	5.4	8.1	—	1.5	.7
	r.	—*	9.8	—	2.7	7.1	8.0	10.5	9.2
Syphilis	f.	—	1.6	—	—	1.0	—	—	—
	m.	—	0.8	1.4	2.7	2.0	—	—	—
	r.	—	4.9	—	6.8	5.6	0.5	—	.2
Epilepsy	f.	1.6	—	—	—	1.0	—	1.2	.6
	m.	—	0.8	—	—	0.5	—	—	—
	r.	—	2.4	—	1.4	2.0	—	1.5	.7
Chorea	f.	—	—	—	—	—	—	—	—
	m.	—	—	—	—	—	1.0	—	.5
	r.	—	—	—	2.7	1.0	—	—	—
Hyperthyroidism	f.	—	—	—	—	—	—	—	—
	m.	—	—	1.4	—	0.5	—	—	—
	r.	—	—	—	1.4	0.5	—	—	—
Total		2.4	48.9	4.2	51.5	53.1	30.5	33.2	31.8*
B. Intellectual:									
Mental deficiency	f.	—	—	—	—	—	—	—	—
	m.	1.6	—	—	—	1.0	—	—	—
	r.	—	3.3	—	4.1	3.5	1.0	—	0.5
Dulness ¹	f.	1.6	3.3	—	2.7	4.1	—	—	—
	m.	0.8	5.7	1.4	2.7	5.6	1.5	2.5	2.0
	r.	—	8.1	—	8.1	8.1	2.0	3.5	2.7
Illiteracy or backwardness ²	f.	—	1.6	—	1.6	1.6	—	—	—
	m.	—	5.7	—	4.1	5.1	1.5	—	0.7
	r.	—	6.5	—	6.8	6.6	2.5	2.0	2.2
Total		4.0	34.2	1.4	30.1	35.6	8.5	8.0	8.2*

¹ Presumably congenital: mental age apparently below 12.0 when adult.

² Reading and writing apparently below Standard V when adult.

* The minute discrepancy between these totals, and the sum of the figures as printed in the column above them, arises from the omission, from the body of the table, of all decimals of the second place.

grand-parents: for each of these I have endeavoured to get positive information in every case, having them specially visited whenever possible. Too often, indeed, the information available was imperfect; in some instances there were no records of the grandparents or other remote relatives; and in one or two cases, where the parent was dead or the child illegitimate, the characteristics even of the father himself could never be traced; for similar reasons, partly too because the information at times came chiefly from the mother, the maternal history is apt to be fuller than the paternal.

		Delinquent					Non-delinquent		
		Boys		Girls		Av.			
		Major factor	Minor factor	Major factor	Minor factor		Boys	Girls	Av.
<i>C. Temperamental (pathological symptoms):</i>									
Insanity	f.	—	—	2.7	1.4	1.5	1.5	—	0.7
	m.	1.6	—	—	—	1.0	—	—	—
	r.	—	5.7	—	8.1	6.6	3.5	2.5	3.0
Minor neuropathic or psychopathic symptoms	f.	1.6	4.9	1.4	1.4	5.1	1.0	3.5	2.2
	m.	2.4	5.7	4.1	2.7	7.6	5.5	2.0	3.7
	r.	—	3.3	—	6.8	4.6	6.0	4.0	5.0
Temperamental deficiency	f.	3.3	0.8	4.1	1.4	4.6	1.5	—	0.7
	m.	2.4	1.6	2.7	4.1	5.1	2.0	1.0	1.5
	r.	—	4.1	—	9.5	6.1	3.0	2.5	2.7
Total		11.3	26.1	15.0	35.4	42.2	24.0	15.5	19.7
<i>D. Temperamental (moral symptoms):</i>									
Sexual irregularity	f.	—	3.3	2.7	4.1	4.6	2.0	—	1.0
	m.	0.8	13.0	4.1	21.6	18.2	5.0	3.5	4.2
	r.	—	2.4	—	16.2	7.5	2.5	6.0	4.2
Violent temper; cruelty	f.	1.6	9.0	1.4	6.8	9.6	1.5	—	0.7
	m.	—	3.3	1.4	4.1	4.1	0.5	1.0	0.7
	r.	—	6.5	—	4.1	5.6	—	—	—
Acquisitiveness*	f.	2.4	3.3	—	2.7	4.6	—	2.0	1.0
	m.	—	0.8	—	4.1	2.0	—	—	—
	r.	—	11.4	—	9.5	10.6	3.5	1.5	2.5
Wandering†	f.	2.4	3.3	1.4	2.7	5.1	—	2.0	1.0
	m.	1.6	0.8	1.4	—	2.0	—	—	—
	r.	—	13.8	—	8.1	11.7	—	1.5	0.7
Suicide	f.	—	2.4	—	4.1	3.0	—	—	—
	m.	—	—	—	1.4	0.5	—	—	—
	r.	—	0.8	—	2.7	1.5	1.0	—	0.5
Idleness (extreme)	f.	—	5.7	—	2.7	4.6	1.5	3.0	2.2
	m.	—	1.6	—	4.1	2.5	—	—	—
	r.	—	8.1	—	14.9	10.6	1.0	5.5	3.2
Alcoholism	f.	—	12.2	—	16.2	13.7	4.5	7.0	5.7
	m.	—	7.3	—	20.3	12.2	4.0	2.5	3.2
	r.	—	8.1	—	17.6	11.7	5.5	6.0	5.7
Total		8.8	117.1	12.4	168.0	145.9	32.5	41.5	37.0*

³ Chiefly convicted for theft.

⁴ Migration (gipsies, tramps) and emigration among adults. Truancy and wandering among children.

* The minute discrepancy between these totals, and the sum of the figures as printed in the column above them, arises from the omission, from the body of the table, of all decimals of the second place.

It will be observed that defective conditions, presumably hereditary, were encountered in the family histories of the delinquents over 270 times per cent., but in those of the non-delinquent cases less than 97 times per cent.; and, further, that these conditions seemed directly contributory

in some 26 per cent. of the delinquent boys and some 33 per cent. of the delinquent girls. Not all the inheritable conditions were themselves criminal qualities; but qualities apparently criminal bulk larger than the rest. What are termed, indeed, in the table "temperamental disturbances with moral symptoms" recur far more frequently than any other family defect. They were found over 145 times per hundred delinquent cases. But, on referring to the figures for the non-delinquent group, we find that the same conditions re-appear there too with unexpected frequency; and the resulting coefficient of association proves to be only .33.

From the foregoing percentage it might be concluded that on an average each delinquent child has between one and two relatives guilty of moral lapses. The commonest of these transgressions, however—alcoholism, suicide, minor sexual offences, and minor outbreaks of temper—are hardly to be classed as typical crimes; and, whether venial or grave, the larger portion of them tends to be concentrated in a relatively small number of families. As many as four-fifths of the children could plead no history among their various relatives of any definable crime.

Out of all the cases only 7.6 per cent. had fathers or mothers ascertainably convicted of a criminal offence¹. In addition another 6.6 per cent. had parents guilty of similar offences, though never judicially convicted. Again, 14.2 per cent. had brothers or sisters guilty of flagrant delinquencies, among whom 6.1 had been sentenced; and 9.1 per cent. had remoter relatives guilty of such offences, among whom 6.6 had been sentenced. There were in all 10.6 per cent. whose relatives had been sentenced for crime, and 19.3 per cent. whose relatives, whether sentenced or not, were known to have committed some gross offence².

It will be seen, therefore, that the number of criminal children who

¹ Chiefly stealing, embezzlement, burglary, assault, and soliciting. Suicide, and being drunk and disorderly have not been accounted criminal.

² The statistics on this subject differ enormously in different investigations. For example, in Baden, Gruhle (*Die Ursachen der jugendlichen Verwahrlosung und Kriminalität*, 1912, Table XVI) found that the parents had been sentenced in 71 per cent. of his cases. In Hanover, Mönkemöller (*Zeitschr. f. d. Erforsch. u. Behandlung d. jugendl. Schwachsinn*, 1897, Vol. iv.) found that 48 per cent. of his cases came from criminal parents. In Westphalia, Rizer (*Ibid.* 1910, Vol. III. p. 119) found the percentage was only 23. In Sweden, Lund (*Über d. Ursachen d. Jugend Asozialität*, 1918) found, in the two groups investigated by him, percentages of 11.0 and 17.1 respectively. Healy (*loc. cit.* p. 153) states that, in his group of 668 juvenile delinquents at Chicago, 40.6 per cent. had no record of prior criminalistic tendency in their families; among the remainder 36.7 per cent. of the total were epileptic or mentally deficient; only 22.8 per cent. had other criminalistic members in their family, without themselves being mentally subnormal; but here a detailed investigation revealed many other causal factors, which in Healy's view seemed more significant.

themselves possess criminal parents or criminal relatives is, after all, comparatively few. And, even here, small evidence exists to establish that the criminal propensities of the family have been transmitted to the offspring by direct biological inheritance. Other causes, less hypothetical in character, more obvious in their mode of operation, could, in my own cases, often be elicited; and their removal was followed, in not a few examples, with immediate and entire success. Many of these provocative conditions—bad companions, bad neighbourhoods, bad discipline, and a bad example at home—were manifestly due to the moral laxity of the parents themselves, the degeneracy of the family thus operating indirectly through the resulting environment, instead of directly by hereditary transmission. The only cases in which the vices of the child stood in a direct and apparently hereditary relation to the vices of the parent, belonged to specifically limited types—namely, sex-delinquency (by far the most frequent), and a few instances of wandering, violent temper, and impulsive stealing. Of these every one may be accounted for by a simple assumption—by supposing that certain human instincts, which by their very definition are acknowledged to be inherited, may be inherited in differing degrees of natural strength. But even here the instinct is not itself inevitably a criminal one; and once it is afforded some legitimate outlet in social activities or wholesome recreation—through marriage, wage-earning, emigration, or the pursuits of the football field or the boxing club—its manifestations can be diverted from illicit enterprises, and directed into lawful channels.

It seems, therefore, that we can regard the hereditary constitution of the criminal as having at most but an indirect influence. The family temperament, first manifested in the lawlessness of his parent, is not, of necessity, a specifically criminal endowment, hereditary as such, but a more general condition, analogous rather to the congenital enfeeblement of intelligence or physique—extreme degrees of common weaknesses to which we are all more or less susceptible in a minor measure; such weaknesses, when excessive, may favour moral lapses in later life; they in no way constitute a fatal or inexorable impulse towards them.

Figures for these other infirmities, presumably inheritable, are given in the same table (Table V). The most marked is that of hereditary intellectual disability. This was recorded as a direct contributory among 4 per cent. of the boys, but among only 1.4 per cent. of the girls. Either as a major or a minor factor, it appeared altogether among the delinquents generally nearly 36 times per cent., but only 8 times per cent. among the non-delinquents. Calculated from these two percentages, and

measured by a coefficient of association, the connection between intellectual weakness in the relatives and delinquency in the children rises to .36, a figure higher even than that obtained in the case of moral weakness. As with moral infirmity, so with intellectual: in none but a few exceptional examples is the association thus measured attributable exclusively to true biological inheritance; the faults and limitations of the father or the mother operate quite as much through the social environment they engender; and the dull parent, like the depraved, inevitably creates a home in which discipline is weak, and in which delinquency is only too readily fostered. The two remaining groups of inheritable conditions—namely, physical infirmities, and temperamental defects involving pathological symptoms—show comparatively small coefficients¹.

The problem of the born criminal, however, is not answered and ended by a survey merely of hereditary conditions. What is inherited is necessarily inborn; but what is inborn has not necessarily been inherited. It is quite conceivable that a child may be afflicted with congenital propensities, without those propensities having first emerged in the previous history of his family.

To gain light upon this broader problem, I have endeavoured to separate all cases in which the factors, whether principal or accessory, were of a congenital type. Under this rubric I have included all such physical conditions as appeared to be directly inherited, all intellectual conditions that are now generally assumed to be innate (as mental deficiency and general dulness), all instances of general emotionality not due to adolescence, and all instances of a natural over-development of a primary instinctive disposition; examples of mere educational disability, instances of repressed complexes and of defective or undesirable interests, I have excluded. We have thus a division of cases and causes into those predominantly congenital and those predominantly acquired. I must insist once more that such a distinction is, and can be, nothing but a rough and somewhat speculative one.

Altogether, congenital factors, whether major or minor, are found

¹ The four coefficients cited in the text are calculated from the frequency of the specified conditions among all the nearer relatives of the children. If we base the coefficients upon the appearance of the conditions among the parents only, the association is somewhat higher (see second column, Table IV). It will be noted that for physical conditions the coefficient is nearly doubled when we restrict our data solely to the parents. This, however, but confirms the suspicion that the working of such a factor is not entirely through direct biological inheritance. In many of these cases the parental condition, though often showing itself as some hereditary weakness in the child, also conduced to poor discipline in the home.

some 259 times per cent. among the delinquents, but only 92 times per cent. among the non-delinquents. Non-congenital factors are entered 208 times per cent. among the non-delinquents and among the delinquents 746 times, or, if we omit the psycho-analytic complexes (which were uninvestigated in the control group), 593 times. Thus congenital factors have been recorded among delinquents 2·8 times as often as among non-delinquents; and non-congenital factors 3·8 times as often, or, omitting complexes, 3·6. The major factor proves to be of a congenital type among 35·7 per cent. of the boys and among 40·9 per cent. of the girls. Thus, *in well over one-third of the cases, but in rather less than one-half, some congenital weakness is the preponderant factor.*

The share of congenital conditions in the production of delinquency is thus undoubtedly considerable. These are, indeed, the cases that are likely to be the most obstinate, and to be most in need of curative rather than punitive measures. But it would be a gross misconstruction—a mistake too commonly deduced from current fatalistic theories—to depict them as hopeless victims of their inborn nature. And at the same time it will be perceived that there still remains a large balance of delinquents—between 50 and 60 per cent. of the total—who owe their delinquency predominantly to the difficulties of their environment or to the events of their own past life.

The distribution of principal causes into congenital and non-congenital reveals proportions very dissimilar in my own cases to that announced by previous investigators. Among Healy's recidivists¹, environmental influences formed the cardinal factor in only 25 per cent. of the cases and a subsidiary factor in as many as 76 per cent.; on the other hand, mental abnormalities and peculiarities, for the most part presumably innate, played a major part in 55 per cent. and a minor part in only 16 per cent. From these proportions we might be induced to argue that the prime causes of delinquency were, in the majority of instances, inborn psychological characteristics; and that the environmental factors were, as a rule, only accessory. Healy, however, has taken into account chiefly the more extreme psychological conditions—as feeble-mindedness, hysteria, "epileptic mentality," markedly neurotic and psychotic states; and it would seem that the cases submitted to him, partly, no doubt, because they consisted of older, more hardened, and more habitual types, and partly perhaps because they were singled out by the court as in special need of examination at a psychopathic institute, comprised a number disproportionately large of gross aberrations of this kind.

Gruhle, in a small enquiry often cited, has attempted, on lines similar to the foregoing, to divide his cases into congenital and environmental types. The figures given by him, based upon the histories of 105 youths, strongly favour the importance of inborn constitution. His proportions are the following: congenital cases 40·9 per cent., environmental cases 9·1 per cent., congenital and environmental factors being

¹ *Loc. cit.* pp. 130–132.

equally balanced in 40.9 per cent.¹ Lund's data, on the other hand, emphasise rather the power of environment; his figures are as follows: in one investigation, the congenital cases numbered 23.4 per cent., and the environmental 65.7 per cent., environmental and congenital factors being equally balanced in 10.9 per cent.; in a second series, the congenital cases numbered 21.1 per cent., the environmental 64.9 per cent., the factors being again equally balanced in 11.9 per cent.²

In one significant feature this and most foreign studies of recent date seem broadly in agreement. Whatever may be our various theories upon the relative importance of the two factors, most cases of juvenile delinquency are, after all, admitted almost universally to be the joint product of social environment and congenital constitution, working together and playing the one upon the other. Gruhle, for example, so often cited in favour of the inborn factor, nevertheless recognises a "mixed type" of criminal, neither purely congenital, nor purely environmental, comprising practically 70 per cent. of his cases. Lund makes a similar concession, though to a less generous extent; in one of his investigations 36.0 per cent., and in another 39.8 per cent. belonged to this mixed type. Both writers, it is true, claim, even within this blended group, to discover now environment, and now constitution preponderating; but, as just remarked, they still find an appreciable proportion in which the two tributaries are so equally balanced that not even this distinction can be hazarded.

I personally should hesitate to recognise any "pure types" whatever. The practical test of a pure congenital type, is, I suppose, that, no matter how perfect the environment found for them, in the most comfortable of homes, in the best disciplined of institutions, they still evince propensities to crime. By this criterion 18 per cent. of my cases show hopeless and ineradicable delinquency. Their irremediable condition, however, I incline to attribute less to original endowment than to long-standing habit. They are, nearly all of them, old offenders. But I suspect that, detected and treated at an early stage, and provided with a suitably adjusted environment, were it only the environment of a segregated colony, the worst and dullest of them might yet have been rescued, and converted into quiet workers and law-abiding members of their own little community.

II. ENVIRONMENTAL FACTORS.

In the child's environment the adverse conditions noticed have been grouped under five main heads (Table II). Of these, defective home discipline seems the one most vitally connected with juvenile crime. Between this factor and delinquency the average coefficient of association (Table IV) is .46. A vicious home atmosphere is almost equally detrimental. Defective family relationships, and undesirable surroundings outside the home, exert a smaller, yet still an appreciable, effect. The pressure of poverty, with its more immediate concomitants, seems, at any rate in its direct relation to delinquency, of comparatively slight significance.

¹ *Loc. cit.* p. 23. The cases here classed together as congenital he has sub-divided into a purely congenital and a predominantly congenital group; and similarly with the environmental.

² *Loc. cit.* p. 233.

A glance at the particular features classed under these five headings (Table VI) reveals still further differences within each broad category.

TABLE VI. II. *Environmental Conditions.*

	Delinquent					Non-delinquent		
	Boys		Girls		Av.	Boys	Girls	Av.
	Major factor	Minor factor	Major factor	Minor factor				
A. <i>Within the home:</i>								
1. <i>Poverty and Concomitants:</i>								
Home circumstances ¹ : very poor (A & B)	1.6	19.5	—	14.9	18.7	21.0	15.0	8.0
poor (C & D)	—	35.8	—	37.8	36.5	36.0	38.0	22.0
comfortable (E & F)	—	[39.9]	—	[44.6]	[41.7]	[39.5]	[44.5]	[54.0]
well-to-do (G & H)	—	[3.3]	—	[2.7]	[3.0]	[3.5]	[22.5]	[16.0]
Overcrowding ²	—	16.3	—	20.3	17.7	13.0	14.5	13.7
Absence of facilities for occupation and amusement at home	1.6	10.6	—	5.4	9.6	8.5	6.5	7.5
Total	3.2	82.2	—	78.4	82.5	78.5	74.0	51.2*
2. <i>Defective family relationships:</i>								
Father dead	1.6	9.0	1.4	13.5	12.2	13.5	11.5	12.5
deserted, separated, or divorced	—	6.5	2.7	10.8	9.1	0.5	—	0.2
absent ³	3.3	15.4	—	12.2	16.2	8.5	7.0	7.7
Mother dead	0.8	9.8	4.1	14.9	13.7	3.5	4.5	4.0
deserted, separated, or divorced	—	5.7	1.4	6.8	6.6	—	—	—
Both mother and father dead or deserted	—	[1.6]	[1.4]	[5.4]	[3.5]	[0.5]	[1.0]	[0.7]
Prolonged absence from parents:								
with friends or relatives	—	10.6	—	17.6	13.2	1.0	0.5	0.7
at institutions	—	13.0	—	18.9	15.2	0.5	—	0.2
Step- (or foster) father	—	7.3	—	14.9	10.1	5.5	4.5	5.0
Step- (or foster) mother	—	12.2	2.7	17.6	15.2	2.0	2.5	2.2
Illegitimate ⁴	—	6.5	—	9.5	7.6	0.5	1.0	0.7
Only child	—	15.4	—	6.8	12.2	2.5	1.0	1.7
Total	5.7	111.4	12.3	143.5	131.3	38.0	32.5	35.2

¹ The classification used is that suggested by Charles Booth (*Life and Labour in London*, Vol. 1. Pt. I, pp. 33 *et seq.*). His categories are as follows:

A. Occasional labourers; loafers; street-sellers; the criminal and semi-criminal. (In my cases, 7.3 % of the boys, and 5.4 % of the girls came from homes of this type.)

B. Irregular earnings; casual labour.

C. Intermittent earnings; seasonal labour.

D. Small regular earnings.

E. Regular standard earnings; artisans; small shop-keepers (with no assistants).

F. High class labour, well-paid; foremen; best-paid artisans.

G. Lower middle class; shop-keepers; tradesmen; small employers; clerks.

H. Upper middle and upper classes; servant-keeping class.

The grouping of the categories in pairs, and the titles for the composite categories, are Booth's.

Since the non-delinquent children were definitely selected as belonging in the same proportions to the same social classes, the percentages would be the same as for the delinquents. In the last column, therefore, I have given instead Charles Booth's estimates for the relative proportions of the whole population of London comprised in the several groups. The borough in which my survey was made shows, according to his tables, almost exactly the same proportions as London taken as a whole.

² Tenements with more than two occupants per room.

³ Chiefly, absent for a long period upon military service; in some instances, recently returned. Also includes illegitimate cases where the father is not living with the mother.

⁴ Includes also the few cases born out of wedlock where the mother and father afterwards married, or lived together as married.

* Figures in brackets are not included in the totals. The discrepancy between the totals for the boys and girls and the average total is accounted for in footnote (1).

		Delinquent					Non-delinquent			
		Boys		Girls		Av.	Boys	Girls	Av.	
		Major factor	Minor factor	Major factor	Minor factor					
3. Defective discipline:										
Indifference (no attempt at discipline)	f.	—	3.3	—	1.4	2.5	—	—	—	
	m.	0.8	6.5	—	4.1	6.1	0.5	—	0.2	
Weak discipline (due to moral or intellectual weakness)	f.	—	9.0	—	4.1	7.1	1.0	—	0.5	
	m.	2.4	24.4	1.4	16.2	23.4	3.5	2.0	2.7	
Weak discipline (due to physical weakness)	g.	—	—	2.7	1.4	1.5	—	—	—	
	f.	—	2.4	—	1.4	2.0	—	0.5	0.2	
Weak discipline (due to absence of parent at work)	m.	3.3	6.5	1.4	5.4	8.6	1.0	3.0	2.0	
	g.	—	1.6	—	1.4	1.5	—	—	—	
Over-strict discipline	f. ⁵	—	2.4	—	4.1	3.0	—	—	—	
	m.	0.8	7.3	—	2.7	6.1	3.0	0.5	1.7	
Disagreement about management of child	f.	1.6	13.0	—	1.4	9.6	2.5	3.0	2.7	
	m.	—	1.6	2.7	2.7	3.0	0.5	2.0	1.2	
	r.	—	—	—	2.7	1.0	—	—	—	
	Total	—	4.9	—	2.7	4.1	—	—	—	
4. Vicious home:										
Sexual immorality at home ⁶		—	2.4	1.4	6.8	4.6	—	0.5	0.2	
Molestation ⁷		—	—	—	2.7	1.0	—	—	—	
Irregular unions ⁸		—	4.1	—	9.5	6.1	0.5	1.0	0.7	
Drunkenness ⁹		—	6.5	—	10.8	8.1	2.5	3.5	3.0	
Quarrelling		—	5.7	—	8.1	6.6	1.0	0.5	0.7	
Ill-treatment	f.	—	2.4	—	5.4	3.5	0.5	—	0.2	
	m.	0.8	—	1.4	2.7	2.0	—	1.5	0.7	
Neglect	g.	—	1.6	1.4	4.1	3.0	—	—	—	
		—	4.1	—	5.4	4.6	5.0	2.5	3.7	
Criminal encouragement		0.8	0.8	1.4	—	1.5	—	—	—	
Bad companionship (within the child's home)		—	3.3	1.4	2.7	3.5	—	—	—	
Bad companionship (in institutions or other residences away from home)		1.6	2.4	—	4.1	4.0	—	—	—	
Vicious or criminal conduct at home (not included in foregoing) ¹⁰		—	6.5	—	8.1	7.0	0.5	—	0.2	
Total		3.2	39.8	7.0	70.4	55.5	10.0	9.5	9.7	

⁵ There being no mother.⁶ Not included under preceding or following headings.⁷ Sexual: by relatives in the home.⁸ Chiefly parents (or foster parents) living together unmarried.^{9, 9, 10} In this section only present or recent misconduct in the child's own home is included: the figures given under "hereditary conditions" include also offences committed in the remote past or away from the child's own home.¹⁰ Chiefly stealing or habitual gambling and betting.

	Delinquent					Non-delinquent		
	Boys		Girls		Av.			Av.
	Major factor	Minor factor	Major factor	Minor factor		Boys	Girls	
B. Outside the home:								
Molestation ¹¹	—	0.8	1.4	4.1	2.5	—	—	—
Corrupted by adult companions or strangers	0.8	—	2.7	1.4	2.0	—	—	—
Indulged by adult companions or strangers	—	3.3	—	2.7	3.0	—	0.5	0.2
Bad companions of same age ¹²	3.3	16.3	1.4	13.5	17.7	1.0	—	0.5
Companions of same age, not actively bad ¹³	1.6	7.3	—	5.4	7.6	3.5	2.0	2.7
Special facilities for amusement ¹⁴	2.4	7.3	—	9.5	10.6	10.5†	12.0†	11.2
Defective facilities for amusement ¹⁵	—	4.1	—	1.4	3.0	4.0†	4.5†	4.2
Uncongenial school	0.8	4.1	—	2.7	4.1	0.5	—	0.2
Uncongenial work	—	4.9	—	2.7	4.1	1.5	—	0.7
Out of work	—	6.5	—	2.7	5.1	1.0	0.5	0.7
Total	8.9	54.6	5.5	46.1	59.7	22.0	19.5	20.7

¹¹ Sexual: by persons outside the home.

¹² Engaged in, or encouraging, delinquency, whether working in gangs or only in pairs.

¹³ Only indirectly or unwittingly by encouraging delinquency, *e.g.* wealthier companions associating with poorer delinquent.

¹⁴ Chiefly the presence of new or gaily advertised cinemas, music-halls, restaurants, or sweet-shops: entered as a major cause only when the delinquency began with their opening, ceased with removal from the neighbourhood, and was directly connected with the facilities in question, *e.g.* stealing to go to the cinema; entered as a minor cause when the delinquency increased or decreased with opening or removal, or was connected with the facilities in a more indirect fashion, *e.g.* meeting undesirable companions at a restaurant.

¹⁵ No neighbouring parks, playing fields, or recreation grounds.

† Children selected as living in the same street as the corresponding delinquent cases.

Through the lax discipline they induce, intellectual or moral weaknesses in the mother, are evidently apt to foster crime¹. Overstrictness on the part of the father operates, quite as frequently, as an active irritant. Illegitimacy, the presence of a stepmother, the absence of the true father or mother through death, desertion, or divorce, residence away from home in institutions or with relatives—these several circumstances appear, on comparing the corresponding figures from the control group, to recur with exceptional frequency among the young criminals. On the other hand, drunkenness, overcrowding and general neglect—conditions which in this connection have been so repeatedly stressed—seem less distinctive; prevalent though they are in delinquent homes, they prove unexpectedly common among non-delinquent families belonging to the same social class; and it is plain that, as contributory factors in the production of crime, they are far less provocative than quarrelling, sexual irregularity,

¹ It must be remembered, however, that the weaknesses of home discipline are less open to detection where the children are non-delinquent, and therefore comparatively easy to manage.

and vicious behaviour among the members of the child's family. Outside the child's home the main demoralising influence comes evidently from his own bad companions in the streets.

In the totals for the environmental factors (Table II) the sex-divergence is but slight. Taken as a whole, external influences, it might seem, weigh almost equally upon boys and upon girls. Yet, studied in detail, their specific working differs somewhat with the difference of sex. Weakness of discipline within the home, and pernicious companionships and interests outside the home, bring graver consequences with the boys. On the other hand, defects in family relationships, and, above all, vice in the home itself, seem conspicuously disastrous with the girls¹.

III. PHYSICAL FACTORS.

Physical defect appears somewhat commoner among the delinquent girls than among the delinquent boys. Its real influence, however, lies chiefly in its indirect reaction on the mind. Anything that weakens health tends to weaken self-control; anything that heightens irritability tends also to heighten liability to anti-social outbreaks.

Measured by the coefficient of association (Table IV) the connection between delinquency and physical defect in general, seems relatively small. Nevertheless, a few of these disabilities stand out significantly (Table VII)². Conditions that lower self-confidence and reduce efficiency in daily work—defects of speech and hearing, poor and undersized physique, and the commoner weaknesses of health and body generally—

¹ The conclusions here offered are based not only upon the figures in the tables, but also upon first-hand observation of the interplay of the factors enumerated, and upon concrete impressions gathered during actual interviews, which bear out the slighter and more abstract indications of the statistics.

² The figures for *encephalitis* are somewhat high owing to a recent epidemic. For the after-effects of this disease, I may perhaps refer to my review of Dr Paterson's enquiry in the last number of this *Journal*, Vol. II, Part 3, p. 237. On the whole, my investigations, particularly among normal children generally, seem to indicate that the direct and deleterious influence of gross nervous disease—meningitis, epilepsy, and so forth—has been by medical writers far too readily assumed. I am inclined to say the same of congenital syphilis, except possibly where it has been productive of intellectual deficiency. Goddard, indeed, believes (*Juvenile Delinquency*, p. 106) that "a surprisingly large proportion of delinquency is due to this disease." But where, in my own cases, it was encountered or suspected, there usually existed in the parents markedly uncontrolled instincts and emotions, which, inherited by the child, are quite as likely to be responsible for his depravity. The small percentages for syphilis in Table VII as compared with those in Table V suggest that, had it been possible to use more precise methods of determination, a larger proportion of the children might have exhibited positive evidence of a mild infection.

TABLE VII. *III. Physical Conditions.*

	Delinquent					Non-delinquent		
	Boys		Girls		Av.	Boys	Girls	Av.
	Major factor	Minor factor	Major factor	Minor factor				
Over-developed (physically)	—	4.1	—	4.1	4.0	1.0	2.5	1.7
Over-developed (sexually ¹)	0.8	3.3	2.7	6.8	6.1	—	0.5	0.2
Delayed puberty	—	0.8*	—	2.7†	1.5	—	0.5†	0.2
Menstruation (accompanied by psychic disturbance)	—	—	—	4.1	1.5	—	1.0	0.5
Attractive appearance	—	3.3	—	13.5	7.1	1.5	3.5	2.5
Undersized	0.8	7.3	—	2.7	6.1	1.0	0.5	0.7
Malnutrition, (a) slight	—	17.1	—	10.8	14.7	15.0	13.5	14.2
(b) marked	—	4.1	—	2.7	3.5	3.0	2.5	2.7
Rickets	—	7.3	—	2.7	5.6	5.5	4.0	4.7
Anaemia	—	4.1	—	6.8	5.0	1.5	3.0	2.5
Chronic catarrh	—	17.9	—	16.2	17.3	9.5	5.0	7.2
Enlarged glands, tonsils and adenoids	1.6	12.2	—	6.8	11.2	10.5	13.0	11.7
Hyperthyroidism	—	—	1.4	2.7	1.5	—	0.5	0.2
Syphilis, (a) congenital	—	—	—	2.7	1.0	—	—	—
(b) acquired	—	—	—	1.4	0.5	—	—	—
Tuberculosis	—	1.6	—	2.7	2.0	—	—	—
Pre-tubercular conditions ²	—	2.4	—	4.1	3.0	2.5	0.5	1.5
Acute rheumatism	—	4.1	—	5.4	4.6	0.5	3.0	1.7
Rheumatic conditions	—	8.1	—	9.5	8.6	2.0	8.5	5.2
Chorea, (a) definite	0.8	—	1.4	—	1.0	—	—	—
(b) suspected ³	—	4.1	—	8.1	5.6	—	1.5	0.7
Epilepsy, (a) grand mal	0.8	—	—	—	0.5	—	—	—
(b) suspected ⁴	[4.1]	—	[1.4]	—	[2.0]	—	—	—
Encephalitis; meningitis	2.4	1.6	2.7	—	3.5	0.5	—	0.2
Recurrent headaches	—	6.5	—	12.2	8.6	2.5	5.5	4.0
Minor nervous defects	—	4.9	—	9.5	6.6	0.5	1.0	0.7
Defective vision, (a) slight ⁵	—	8.1	—	12.2	9.6	10.5	13.5	12.0
(b) marked	0.8	4.1	—	10.8	7.1	8.5	9.0	8.7
Squint (marked)	—	0.8	—	2.7	1.5	—	—	—
Defective hearing, (a) slight ⁶	—	3.3	—	4.1	3.5	2.0	5.5	3.7
(b) marked	1.6	—	—	1.4	1.5	—	—	—
Defective speech	0.8	0.8	—	—	1.0	0.5	—	0.2
Lung defects	—	—	—	1.4	0.5	1.0	1.5	1.2
Heart defects	—	2.4	—	1.4	2.0	—	2.0	1.0
Local irritation ⁶	0.8	1.6	1.4	4.1	3.5	—	—	—
Total	11.2	135.9	9.6	176.3	160.8	79.5	101.5	90.5

¹ Including premature puberty (i.e., commencing at 13.0 years with boys, and 12.0 years with girls).² Including suspected tuberculosis.³ Including mild or sub-choreic conditions.⁴ Including 'psychic' and 'masked' epilepsy. Diagnosis suggested by medical examiner, but unsupported by subsequent information. Figures not counted in totals.⁵ For definition see *Report upon Backward Children in Birmingham*, pp. 19-20.⁶ Pruritus vulvae, Herpes praeputialis, etc.^{*} Voice unbroken and no signs of pubescence at 17.0 years.[†] Menstruation not commenced at 16.0 years.

are somewhat more prevalent among the delinquent boys. Conditions that touch the emotional life—chorea, hyperthyroidism, petty nervous defects, excessive or premature sexual development¹—states, on the whole, somewhat exceptional in their nature, are to be noted principally among the delinquent girls. In general, however, physical defect is far less prominent in the criminal groups here analysed than in the populations examined in prisons and reformatories by earlier investigators. Further, it should be observed, that, to be operative as a contributory factor, a physical condition need not necessarily be an abnormality or a defect. Such gifts as a vigorous physique, good looks, deft fingers, and keen senses, may prove definite assets in a career of crime, particularly to the weak-minded; and may often assist the young culprit, not only to perpetrate his delinquency, but also to avert suspicion and escape arrest.

Stigmata, numerous or well-marked, were present in 7.6 per cent. of my delinquent cases and in 2.5 per cent. of the non-delinquent. But the excess in the former group was due almost exclusively to the disproportionate number of defectives, of the temperamental as well as of the intellectual type. There was no evidence whatever that the delinquent child, otherwise normal in mind and body, is specifically distinguished by anomalies of anatomical development.

IV. PSYCHOLOGICAL FACTORS.

A crime is a conscious action. Hence, its immediate if not always its main cause, must be a psychological one. And it is not surprising to find that, in the table, psychological causes figure as by far the most numerous (Table VIII).

But in all this long list of psychological pre-conditions is there any that is fundamental and all-pervading? Is there any inborn factor, simple and central, underlying the manifold forms of criminal activity, analogous to those central factors now held to underlie all intellectual activities on the one hand, and all emotional activities on the other? Plainly, there

¹ I connect the prevalence of mild or suspected choreic conditions with the prevalence of rheumatism; and the prevalence of rheumatism with the recurrence of chronic catarrh. Doubtless other toxines have similar effects upon the nervous system; and the cases of hyperthyroidism suggest a causal relation between delinquency and the disturbances of endocrine balance. This, and the conditions alluded to in the preceding note, indicate suggestive fields for future research. Meanwhile, it must be noted that my own conclusions respecting physical factors apply only to the more obvious defects, such as are observed during an ordinary medical inspection in the school.

TABLE VIII. IV. *Psychological Conditions.*

	Delinquent					Non-delinquent		
	Boys		Girls		Av.	Boys		Av.
	Major factor	Minor factor	Major factor	Minor factor				
<i>A. Intellectual:</i>								
<i>a. General:</i>								
Mental deficiency ¹	5.7	2.4	2.7	4.1	7.6	1.0	1.5	1.2
Natural dullness ²	4.1	[22.8]	4.1	[25.7]	[27.9]	[10.5]	[9.0]	[9.7]
Educational backwardness ³	1.6	40.7	—	37.8	39.6	11.0	10.5	10.7
Superior intelligence ⁴	—	3.3	—	1.4	2.5	9.0	8.0	8.5
<i>b. Specific:</i>								
Special disabilities:								
Reading and writing	—	3.3	—	—	2.0	0.5	—	0.2
Arithmetic	—	2.4	—	5.4	3.5	—	2.5	1.2
Miscellaneous ⁵	—	1.6	—	2.7	2.0	—	—	—
Special abilities:								
Verbalist	—	4.9	—	2.7	4.1	1.0	2.0	1.5
Manual dexterity	—	2.4	—	—	1.5	2.5	—	1.2
Total	11.4	61.0	6.8	54.1	62.8	25.0	24.5	24.7
<i>B. Emotional:</i>								
<i>1. Inborn:</i>								
<i>a. General:</i>								
Temperamental instability	4.9	27.7	5.4	31.1	34.0	8.5	10.0	9.2
Temperamental deficiency ⁶	6.5	3.3	8.1	1.4	9.6	0.5	1.0	0.7
Adolescent instability	1.6	—	2.7	—	2.0	—	—	—
Markedly repressed type ⁷	[1.6]	[13.0]	[5.4]	[21.6]	[19.3]	[4.0]	[8.5]	[6.2]
Markedly unrepressed type ⁸	[4.1]	[3.3]	[6.8]	[5.4]	[9.1]	[5.5]	[4.5]	[5.0]
Day-dreaming imaginative	—	7.3	—	16.2	10.6	2.5	9.5	6.0
Emotional apathy ⁹	—	3.3	—	1.4	2.5	1.0	2.0	1.5
Dementia praecox	—	—	1.4	—	0.5	—	—	—
Minor psychopathic conditions	—	1.6	—	2.7	2.0	—	0.5	0.2
Total	13.0	43.2	17.6	52.8	61.2	12.5	23.0	17.7

¹ All feeble-minded cases in the sense of the Defective and Epileptic Children Act: mental ratios being between 40 and 70 per cent.,—usually nearer the latter (or upper) limit.

² Marked inborn retardation in general intelligence not amounting to mental deficiency: mental ratios between 70 and 85 per cent. All the dull are also backward.

³ Marked retardation in educational attainments: educational ratios of 85 per cent. or less. The numbers for dullness are included in those for backwardness; but backwardness is only entered as a major cause where dullness was not a major cause.

⁴ Mental ratio over 115 per cent.

⁵ Marked defects of memory or attention, without corresponding defect of intelligence. Marked defect of manual dexterity.

⁶ Extreme emotional instability, existing from birth or an early age.

⁷ So-called introverts. Also entered under Instability and Temperamental Deficiency. This group includes cases of mild neurosis—chiefly compulsion-neurosis, anxiety-neurosis, and anxiety-hysteria. (Figures in brackets are, as usual, not included in totals.)

⁸ So-called extroverts(?). Also entered under Instability and Temperamental Deficiency.

⁹ Including 'constitutional laziness.'

	Delinquent					Non-delinquent		
	Boys		Girls		Av.	Non-delinquent		Av.
	Major factor	Minor factor	Major factor	Minor factor		Boys	Girls	
<i>b. Specific:</i>	1.6	9.0	6.8	17.6	15.7	2.5	1.0	1.7
Homosexual	—	4.1	—	1.4	3.0	0.5*	2.0*	1.2
Bad temper	0.8	8.1	2.7	13.5	11.7	1.5	2.5	2.0
Acquisitiveness	1.6	12.2	—	6.8	11.2	4.5	1.0	2.7
Wandering	3.3	10.6	1.4	5.4	11.2	2.0	0.5	1.2
Self-assertiveness	—	13.0	—	8.1	11.2	4.5	1.0	2.7
Suggestibility	2.4	1.6	1.4	4.1	4.6	3.0	4.5	3.7
Affection	—	[2.4]	—	[4.1]	[3.0]	[2.5]	[6.5]	[4.5]
Timidity	—	[3.3]	—	[5.4]	[4.0]	[2.0]	[4.0]	[3.0]
Sorrow	—	[1.6]	—	[2.7]	[2.0]	[0.5]	[3.0]	[1.7]
Unsusceptible to sorrow	—	4.1	—	5.4	4.6	2.0	0.5	1.2
Unsusceptible to pain	—	3.3	—	1.4	2.5	0.0†	0.0†	—
Gluttony	0.8	10.6	—	4.1	8.6	1.5	0.5	1.0
Incontinence:								
Urinary (present)	—	2.4	—	2.7	2.5	—	1.0	0.5
(past)	—	4.9	—	4.1	4.6	1.0	1.5	1.2
Faecal (present)	—	4.1	—	1.4	3.0	—	—	—
(past)	—	6.5	—	2.7	5.1	0.5	—	0.2
Total	10.5	94.5	12.3	78.7	99.5	23.5	16.0	19.7
2. <i>Acquired:</i>								
<i>a. Sentiments, Interests and Habits:</i>								
Obsessive imagery	—	1.6	—	2.7	2.0	—	—	—
Obsessive habits	—	6.5	—	4.1	5.6	—	—	—
Passion for the cinema	0.8	6.5	—	1.4	5.1	3.5	—	1.7
sweets	—	3.3	1.4	5.4	4.6	2.0	5.5	3.7
money	2.4	1.6	—	1.4	3.0	1.0	—	0.5
clothes	—	—	—	6.3	2.5	—	3.5	1.7
adventure	3.3	15.4	1.4	2.7	13.2	5.0	—	2.5
various forms of pleasure and amusement ¹⁰	—	4.1	1.4	4.1	4.6	0.5	1.0	0.7
a particular person of the opposite sex ¹¹	—	2.4	—	1.4	2.0	2.5	4.5	3.5
Open hatred for a particular person	0.8	—	—	—	0.5	—	—	—
Lack of affection for relatives or friends	—	12.2	—	6.8	10.1	1.5	—	0.7
Lack of cultural interests ¹²	—	3.3	—	1.4	2.5	—	—	—
Total	7.3	56.9	4.2	37.8	55.7	16.0	14.5	15.2

¹⁰ With boys—fun-fairs, travelling in trams, toys, sport, theatres, etc. With girls—restaurants, theatres.

¹¹ Petty love-affairs having no relation to delinquency are not included: figures for normals, therefore, are hardly comparable.

¹² Only noted in children of at least average ability.

* No actual homosexual practices encountered.

† Not tested experimentally.

	Delinquent				
	Boys		Girls		
	Major factor	Minor factor	Major factor	Minor factor	Av.
<i>b. Complexes:</i>					
<i>Auto-erotic complexes:</i>					
Genital ¹³	—	3.3	—	2.7	3.0
Oral	—	2.4	—	4.1	3.0
Urethral	—	0.8	—	1.4	1.0
Anal	—	8.1	—	2.7	6.1
<i>Self-regarding complexes:</i>					
Narcissistic:					
Self-love: personal vanity	—	1.6	—	9.5	4.6
With homosexual aspect	—	0.8	—	1.4	1.0
Frustrated mother-fixation (starved affection) ¹⁴	—	3.3	—	8.1	5.1
Continued mother-fixation (chiefly over indulged during convalescence)	—	4.1	—	2.7	3.5
Belated mother-fixation (partial struggle against dependence)	—	7.3	—	4.1	6.1
Self-assertive (authority-complex)	1.6	10.6	—	5.4	9.6
(wish for power; sadistic?)	—	3.3	—	—	2.0
<i>Inferiority complexes:</i>					
(a) Physical	1.6	3.3	—	1.4	3.5
(b) Mental	—	2.4	—	4.1	3.0
(c) Sexual ¹⁵	—	—	—	2.7	1.0
<i>Parental:</i>					
Attachment to father	—	2.4	1.4	12.2	6.6
Antagonism to mother	1.6	1.6	2.7	9.5	6.6
Attachment to mother	—	12.2	—	10.8	11.7
Antagonism to father	2.4	14.6	—	8.1	13.7
<i>Parental, with transference:</i>					
Antagonism to step-father	—	0.8	—	—	0.5
Attachment to step-mother	—	—	—	2.7	1.0
Antagonism to step-mother or foster-mother ¹⁶	0.8	6.5	2.7	6.8	8.1
Attachment to elder brother	—	—	—	4.1	1.5
Antagonism to elder brother	—	4.9	—	1.4	3.5
Attachment to elder sister	—	3.3	—	—	2.0
Antagonism to elder sister	—	0.8	1.4	2.7	2.0
Attachment to younger brother or sister	—	1.6	—	2.7	2.0
Antagonism to younger brother or sister ¹⁷	1.6	2.4	1.4	4.1	4.6
Attachment to step-sister	—	1.6	—	—	1.0
Antagonism to step-brother or step-sister	—	2.4	—	4.1	3.0
Attachment to female cousin in the same home	—	1.6	—	—	1.0
Antagonism to teacher	1.6	5.7	—	5.4	6.6
<i>Conflicts about parentage:</i>					
(a) warranted ¹⁸	—	4.9	1.4	13.5	8.6
(b) unwarranted	—	—	—	5.4	2.0
<i>Sexual complexes¹⁹:</i>					
Actual heterosexual experiences	—	1.6	2.7	4.1	3.5
Actual homosexual experiences ¹⁹	—	3.3	—	1.4	2.5
Repressed sexual temptations	—	0.8	—	2.7	1.5
Birth problems ²⁰	—	1.6	—	4.1	2.5
Obsessions ²¹	—	2.4	—	6.8	4.1
Total	11.2	128.3	13.7	162.9	152.6

¹³ Masturbatory, with guilt.¹⁴ Includes sense of being an "unwanted child" (often justified).¹⁵ Castration-type.¹⁶ Including female relatives or guardians acting in that capacity.¹⁷ Chiefly jealousy of infant children; but includes one instance of jealousy of a petted older brother dating from time he was crippled.¹⁸ The child being actually illegitimate or a step-child.¹⁹ Repressed experiences only; unrepressed experiences are not included.²⁰ Includes one pubescent girl with morbid fear of pregnancy.²¹ By obscene words or stories heard; or obscene pictures or conduct witnessed.

is none¹. Apart altogether from the varying background of bad heredity, bad environment, and bad physique, each at times quite independent of the rest, the psychological defects are themselves most diverse—sometimes intellectual, sometimes temperamental, in some cases congenital, in others acquired. The criminal is far from constituting a homogeneous psychological class.

(A) INTELLECTUAL FACTORS.

States of general intellectual weakness are, beyond question, of great importance in the causation of crime. Mental deficiency, together with natural dulness not amounting to definite deficiency, stands among the commonest of all the major factors. Of the delinquent boys nearly 10 per cent. owe their delinquency primarily to one or other of these conditions; and, in a further 25 per cent., dulness or deficiency appears as a subordinate factor. Nevertheless, the defectives alone form no very large proportion; and the coefficient of association is much higher between crime and educational backwardness than between crime and mere deficiency². Specific intellectual disabilities seem quite unimportant; indeed, they are perhaps as often the consequence as the cause of youthful laxity.

The totals for intellectual abnormalities are, with the present groups, slightly higher among the male delinquents than among the female. Had the majority been, not school cases, but after-school cases, the incidence of intellectual deficiency, like that of intellectual dulness, would doubtless have fallen more heavily upon the girls. And it is suggestive that, in almost every feminine case where dulness or deficiency was the predominating factor, the girl was an adolescent, and the offence a sexual misdemeanour. In comparing the effects of intellectual weakness among the boys and girls respectively, a difference emerges similar to that remarked in the case of physical weakness. The dull, the defective, and the backward

¹ If there is any central factor underlying criminality, it is neither simple nor inborn. Examined by the usual statistical procedure, criminal tendencies appear to be correlated positively one with another, and the table of coefficients shows some approximation to a hierarchy. But any central factor that may be thus implied must be a highly composite one, and dependent quite as much upon environmental influences as upon innate, and quite as much upon extrinsic factors as upon psychological.

² For a fuller discussion of the connection between intellectual weakness and delinquency, see *Mental and Scholastic Tests*, pp. 184–190; and *Psyche*, *loc. cit.* Vol. II. No. 3, pp. 233–243. It is to be noted that the average association coefficient (Table IV) for the intellectual conditions enumerated in the detailed table (Table VIII) is reduced by the negative correlation between delinquency and the presence of supernormal intelligence.

boys suffer largely by being unfitted for their work; the dull girls, by offering less resistance to their own emotional impulses and less opposition to the corrupt persuasions of others. The difference, however, is only one of degree. Instances of either type are to be found among both sexes.

(B) EMOTIONAL FACTORS.

The various factors which I have broadly termed emotional¹ are by far the most numerous of all (Table VIII). Viewed, too, in the light of

¹ A note is needed to indicate very briefly how the elusive task of temperamental assessment was approached.

The strength of the specific instincts and emotions was estimated according to the standard-deviation scale described in my report on the *Distribution of Educational Abilities* (p. 50). To secure as high a degree of comparability as was possible with different assessors, the several grades were defined in two ways; first, abstractly, in terms of the percentages to be expected for each grade out of a random group of a hundred; secondly, and more concretely, in terms of typical individuals picked out as borderline specimens, upon lines now familiar from the American Army rating-scales.

The highest grade in the five-fold scale—the “A” or “+ 2 S.D.” group—was originally defined as including all who diverged above a line drawn at +1.5 S.D., approximately 7 per cent. of the total distribution. But, in dealing with delinquents, it was found useful to split this (and other) grades into two, by the use of plus and minus signs: thus all who diverged above +2.0 S.D. (that is, in a normal distribution, the highest 2.3 per cent.) were marked “A +,” the remainder of this grade (those between +1.5 and +2.0 S.D.) being marked “A -.” The cases enumerated in Table VIII (B. 1 b.) as suffering an excessive development of a specific instinct or emotion, consist of those marked “A +” for that particular quality—of those, that is to say, who deviate above the average of their group by more than twice the standard deviation.

The diagnosis of instability or temperamental deficiency was founded partly upon the average of the gradings for the separate emotions, and partly upon a distinct assessment. A “temperamental defective” was defined as one who, without being also intellectually defective, exhibited from birth or from an early age, the same degree of control over his instincts and emotions generally, as would be exhibited by an average child of half his chronological age or less, or (in the case of an adult) by an average child under eight; this roughly coincides with those marked, for general emotionality, “A +” (above +2.0 S.D.), after those defective in general intelligence (a large proportion) have been eliminated. An “unstable” was defined as one who, in the middle of his school career, would appear retarded in the development of emotional control by about two years, or, more generally, retarded at every age by over 15 per cent. of his chronological age; this group broadly corresponds with those marked “A -” (above +1.5 S.D.) for general emotionality. Special precautions, however, were needful to avoid missing the repressed or sensitive types of instability, whose feelings are often so masked that to a first superficial glance they appear unemotional and even phlegmatic. It would seem that, in general proportions, these two groups—the unstable and the temperamentally deficient—roughly correspond, upon the emotional side, to the two groups designated, on the intellectual side, respectively as dull and as defective.

Psychologically, temperamental deficiency is simply an extreme degree of inborn emotional instability; socially, it comprehends all those who, upon temperamental grounds, need supervision or custodial care for their own protection or for that of others; clinically, just as the intellectually defective comprise a small proportion of definitely pathological

the average association-coefficients (Table IV), delinquency depends much more closely upon emotional conditions than upon intellectual conditions, although it is the intellectual status of the delinquent that has hitherto monopolised the main interest of criminal psychology. The correlation is greatest in the case of specific instincts and emotions. For these the calculated coefficient is among the highest in the table. For the more general emotional conditions, and for the presence of defective or undesirable interests, it is also significantly large. For the influence of repressed complexes no statistical assessment can be offered, since no analysis of such mechanisms was attempted with the non-delinquents. It will be noted, however, that there are, among the delinquents, three times as many "repressed" personalities (often neurotic or psycho-neurotic) as among the law-abiding children.

The total figures for major factors of the several kinds (Table II) reveal at once the high predominance both of general emotionality, on the one hand, and of specific instincts and emotions, on the other. Specific instinctive tendencies—chiefly those of sex, anger, wandering, acquisitiveness, and suggestibility¹—and general emotionality—chiefly in the form of instability, either adolescent or inborn—together constitute nearly one quarter of the major factors among the boys and nearly one-third among the girls. If to these we add all instances where the major factor was a repressed emotional complex, we have accounted for the principal causes among nearly one-half of the entire delinquent group.

The totals for all factors, principal and subordinate (Table II), exhibit emotional conditions as more prevalent among the delinquent girls than among the delinquent boys. This difference, however, springs mainly from the greater frequency of general instability and of repressed complexes among the girls. On the other hand, the delinquent boys seem characterised rather by defective or undesirable interests, and by the over-development of specific instincts. In these respects sex-differences

types, so also a prolonged study will at length disclose that many of the temperamentally defective are undoubtedly "psychopathic,"—a term by which I understand congenital cases of borderline or incipient insanity, the line between amentia and dementia, being, in my view, far less rigid, at any rate upon the temperamental side, than is commonly assumed. The "neurotic" (those suffering from one or other of the recognised neuroses) fall, with this classification, under "repressed unstabiles." A few constitutionally excitable children, popularly dubbed "hysterical," have been grouped under the uninhibited or "un-repressed" type.

¹ Suggestibility itself is perhaps not strictly classifiable as an instinct, but in children at any rate it seems chiefly to arise from a well-recognised instinct, namely, that of submissiveness. The transference of emotion from a complex, however, usually operates as well.

of a somewhat similar nature are to be discerned among the normals. As to particular instincts and emotions, the delinquent girls are marked by an inborn liability to outbreaks of sex and bad temper; the delinquent boys by an excessive liveliness of the migratory, the acquisitive, and the self-assertive instincts. In both sexes a disproportionate percentage of the delinquents seem singularly insusceptible to the inhibitory feelings—pain¹, sorrow, fear², and affection.

COMPLEXES.

Repressed complexes are perhaps not so much themselves the causes of crime, as part of the mental machinery through which the ulterior causes operate. I have classed them as principal factors whenever the delinquency was at length cleared up by a protracted analysis, or whenever the child showed a visible amendment after removal from a source of current conflict. Many of the "complexes" are indeed complex; and that in the highest degree. Their varying elements and distinguishable aspects are exceedingly numerous; and each is recorded separately under a separate heading in the table. Thus, though the cases analysed are few, the total entries are considerable. In spite of this, the figures shown for the frequency of such mechanisms still yield, in all probability, a gross under-estimate. Analytic treatment could only be undertaken when there seemed a reasonable likelihood that it might issue in a practical benefit, or at least cast a gleam of theoretical light upon the genesis of the moral trouble; and even then, from the exigencies of my work, it was impossible to push home the analysis in every case with ideal completeness. With the delinquent boys, in particular, this mode of approach proved difficult and slow; and here, most of all, the percentages may be too slender.

Complexes similar to those discovered among delinquents and neurotics could, with sufficient exploration, be discovered among normals. Indeed, in spite of all the thorough work by the various psycho-analytic schools, it still remains something of a mystery why complexes, apparently identical, should produce abnormal symptoms in one person and

¹ The seeming insusceptibility to pain often amounts, in these self-offered little martyrs, to a definite and perverse pleasure in pain (masochism). Pain, like every sensory stimulus, is in a mild degree pleasurable to all. But, with some, the borderline between pleasant and unpleasant pain is abnormally high; and even an intense smarting is welcomed as delightfully pungent. The bearing of this upon corporal punishment is too obvious to be indicated.

² Many of the younger delinquents, however, are not fearless, but timid (see Table); and so by nature secretive.

none in another. With delinquents various factors seem to further this unfavourable development; defective family relationships obviously give the usual parental complexes a very unusual form; an over-strict or an over-indulgent discipline—particularly when the two alternate within the same household—alike make the conflicts more acute; general instability, and the excessive strength of certain instincts—sex, anger, self-assertion and pleasurable disgust—intensify the lack of emotional balance; other instincts—timidity and unpleasant disgust—make for increased repression. Delinquents, too, manifest a disproportionate number, or at least a disproportionate strength, of certain more primitive complexes—particularly the auto-erotic, the self-regarding, and the more primitive phases of the parental; they often seem to have undergone an arrest or a fixation at these more infantile levels. Finally, innumerable events in the outer and inner life of the delinquent child—removal from home, quarrelling at home, immorality at home, and their secret effects upon his mind, pernicious companions or painful experiences outside the home—all serve to give a special trend to his unconscious emotional development¹.

¹ From the standpoint of treatment it may be noted that, with children, and especially with delinquents, psycho-analytic mechanisms differ in their mode of action from those met with in the case of neurotic adults. In the first place repression seems seldom so complete. It is true that most of my delinquents who suffered from complexes belonged to the repressed or sensitive type; but similar mechanisms were from time to time discernible among those who were of a nature eminently unrepressed. Partly as a consequence, the analysis of young cases is, as a rule, accomplished with greater speed and fewer hindrances than a similar analysis in a neurotic adult. Nevertheless, with delinquents the method brings with it special difficulties of its own; their word is not always to be relied upon; their confidence is at first often difficult to gain; and their desire for treatment and their eagerness to be cured is neither vigorous nor voluntary. With all but the oldest and the brightest, too, the analyst must pursue a somewhat different line from that usually taken with adults; there may, for example, be less talking, less confession, less discussion of dreams and fantasies, more attention to the child's conduct during recreation, and more observation of his natural responses to test-situations, both casual and arranged. My inferences as to the working of complexes of various kinds are thus often derived, not from an actual unravelling of them by a full and systematic exploration, but rather from recognised complex-symptoms noted incidentally in the course of general interviews and everyday behaviour. Fortunately, with children of school age, the most delicate motives of all—active sexual complexes, in the *narrowest* sense of the adjective 'sexual'—seem relatively unimportant; and, unless a child of these tenderer years, by private avowal or by overt acts, spontaneously admits the presence of such conflicts, the cautious analyst will be exceedingly chary of trying to probe for their presence. Sexual problems, sexual conflicts and sexual temptations undoubtedly arise during this so-called 'latent' period; but, sometimes because they are less repressed, sometimes because the repression is for the time being more successful, they cause less worry and lead to less misconduct before the onset of the pubertal epoch. Hence, during the school period, without urgent reasons for entering upon these sensitive issues, the psychologist will, as a rule, be wiser if he prefers discretion—

SUMMARY.

1. Nearly 200 cases of juvenile delinquency, and, as a control-series, 400 normal cases, have been individually investigated in parallel enquiries; and the various adverse conditions, discoverable in their family history, in their social environment, and in their physical, intellectual, and temperamental status, have been ascertained and tabulated for each group.

2. The tables show a lengthy list of contributory causes. Delinquency in the young seems assignable, generally to a wide variety, and usually to a plurality, of converging factors; so that the juvenile criminal is far from constituting a homogeneous psychological class.

3. To attribute crime in general to either a predominantly hereditary or a predominantly environmental origin appears impossible; in one individual the former type of factor may be paramount; in another, the latter; while, with a large assortment of cases, both seem, on an average and in the long run, to be of almost equal weight.

4. Heredity appears to operate, not directly through the transmission of a criminal disposition as such, but rather indirectly, through such congenital conditions as dulness, deficiency, temperamental instability, or the excessive development of some single primitive instinct.

5. Of environmental factors those centring in the moral character of the delinquent's home, and, most of all, in his personal relations with his parents, are of the greatest influence.

6. Psychological factors, whether due to heredity or to environment, are supreme both in number and strength over all the rest. Emotional conditions are more significant than intellectual; while psycho-analytic complexes provide everywhere a ready mechanism for the direction of overpowering instincts and of repressed emotionality into open acts of crime.

if he foregoes the uncertain benefits of ruthless exploration rather than risk the surer perils which may arise when these troublesome interests are stirred up. After puberty the case is changed; but the utmost circumspection must still be exercised.

THE INFLUENCE OF AFFECTIVE FACTORS ON THE MEASUREMENT OF INTELLIGENCE.

BY C. A. RICHARDSON.

THE first decades of the twentieth century have witnessed the rapid growth of two new developments in psychological science, namely the analytic method in psychotherapy and the testing and quantitative assessment of intelligence. The growths of these two movements have been curiously parallel in some respects; neither attracted any marked attention before 1900, each made immense strides during the war. While independent in origin and inception, both have now advanced to a stage at which we are compelled to consider whether each may not afford us information bearing on the theory and practice of the other.

Briefly, the kind of question that is now being asked is this: May it not be possible that the *apparent* intelligence of an individual is in part conditioned by affective inhibitions which conceal his *real* grade of intelligence? Is not a low grade intelligence due in some cases to the action of such inhibitions, and might it not therefore be possible, by analysis directed to the removal of the latter, to increase appreciably a person's mental efficiency?

So far as the measurement of intelligence is concerned, the practical issue to be decided is whether the performance of children and others in mental tests is affected by inhibitions of the kind referred to. Evidently this question could only be settled decisively by testing a number of children and then retesting them after analytic treatment. But, in the absence of such an interesting experiment, it is yet possible to arrive at a provisional, and probably reliable, conclusion, on the basis of considerations relating firstly to the nature of the tests themselves, and secondly to the results of the tests.

No doubt everyone would agree that, even when all disturbing factors are eliminated, children differ very considerably from one another in degree of intellectual capacity. It is unlikely that anyone would be prepared to maintain that, with sufficiently appropriate and complete psychotherapeutic treatment, all could be brought to the same level of intelligence. We may therefore assume that fundamental differences do exist. In other words, it is theoretically possible to rank individuals

in order of intelligence. This implies that for each individual there is a numerical index, constant for that individual, which expresses his position in the hierarchy of intellect. Mental testing will therefore be directed to the discovery of that index, and the question we have to consider is whether such testing does in fact disclose the real index, or merely an apparent value of the latter modified by the influence of affective inhibitions which interfere with the subject's performance in the test. In what follows we shall exclude from our consideration definitely pathological cases, such as those manifesting epilepsy, hysteria, or dementia.

In discussing the effects on a child's performance which the tests exercise by their very nature, it is necessary to distinguish between *general* mental inefficiency and inability to pass certain *specific* tests which may be widely separated in the scale. Affective inhibitions, as opposed to natural dulness or defectiveness, are unlikely to produce general inefficiency unless they are so extreme in character as to verge upon the pathological. Accordingly the important point for our present purpose is the nature of specific tests; and here again we must distinguish between individual tests and group tests. We may leave the question of general inefficiency till we come to consider the results of the tests.

The majority of individual scales in use at present are based on the Binet scale or on one of the numerous revisions thereof. A glance through the questions in these scales will be sufficient to make it clear that by far the larger proportion of them are noticeably lacking in any element which might, for particular individuals, constitute affective or emotional tone in any degree worth considering. It is true that a few of the Binet tests deal with matters which tend to acquire for most persons some marked affective tone, but even in such cases the matters are of a kind calculated to produce far less emotional effect on children than on adults. But apart from these comparatively few and isolated instances the affective tone of the tests is almost entirely neutral.

The reason for this is not far to seek. Intelligence tests being directed to the discovery of the child's innate mental ability as opposed to his acquired knowledge, are so constructed as to call into play relatively fundamental elements in intelligent process. This results in a type of simplicity in marked contrast to the characteristics of ordinary educational tests and of those external conditions which in part determine the progress of the child in his everyday school work. It is a simplicity consisting in a lack of complication by widespread and elaborated associations which, by their assimilation to the matter in question, may

give to the latter a very marked emotional tone, and hence lead to affective inhibition where it is concerned. Doubtless this accounts for the fact that some children who do well in an intelligence test may be making progress in school at a slower rate than their success in the test would lead one to expect. These considerations reveal a merit of the intelligence test which makes it one of the children's safeguards. The writer numbers among his own cases examples both of specific and of general inefficiency in school work which investigation showed clearly to be due to causes of an affective character. Yet the intelligence test penetrated these inhibitions and revealed the true grade of mental capacity to be superior to that manifested in school.

In addition to the inherent nature of the tests themselves, it is necessary to consider for a moment the conditions of their administration. The individual tests are given to one child at a time, and, in general, no one else is present but the examiner. Evidently, such conditions may in certain circumstances, and with children of certain temperaments, be conducive to the setting up of inhibitions. The removal or prevention of inhibitions arising in this way depends for its success almost entirely on experience in the general technique of administering the tests; and the skilled tester (who, it need hardly be said, should be a sufficiently trained psychologist) will quickly recognise symptoms indicating the presence of inhibitions and will know how to deal with the latter. It may safely be said that, with a tester who understands his work, any serious effect due to affective inhibitions arising from the conditions of administration of the tests can be practically eliminated.

When we turn to consider group tests, however, the case is somewhat different. It is true that, among the large number of items which go to make up a group test, there may perhaps be a few which possess marked affective tone for certain children. There seems no reason to suppose that the effect of this, if it exist at all, will be more than slight; and, in any case, the very multitude and variety of the items is likely to ensure that any affective consequences will average out among the different children so as to leave unaffected the reliability of the norms of performance as a basis of comparison.

More serious, however, in the case of group tests, are the possible effects of the conditions of administration. In the majority of group scales the separate tests are given out at intervals, each, after brief verbal instructions from the examiner, being carried out under a strict time limit. The possible effect on certain types of child (e.g. the 'nervous' or 'anxious,' or even 'cautious' child) of this state of affairs can easily

be imagined, and the conditions of the test necessarily render it impossible for the examiner to eliminate disturbing factors by dealing with the children individually. It does not seem possible to get rid altogether of the influence of such factors in a group test; yet, on the other hand, the results of the tests show that the *mass* effects produced by the disturbing elements are negligible, though, of course, injustice may be done to individual children. In the case of individuals, the effects are probably reduced to a minimum in those scales in which the tests are not timed separately but only as a whole, the child being left to work quietly through the questions by himself, without interruptions at intervals by the examiner¹.

It will be clear, then, that an examination of the tests themselves reveals but little in their nature to warrant the conclusion that affective factors may frequently militate to a serious extent against a child's performance. But evidence of a more definite, and therefore more decisive, nature is found to be available when we turn to a scrutiny of the results of the tests. In considering these results we should expect to find the influence, if any, not only of specific inabilities with regard to particular tests arising from specific inhibitions, but also of general inefficiency due to affective factors of a more far-reaching type.

It was pointed out at the beginning of this paper that, when disturbing elements are eliminated, individuals will differ in their respective grades of mental capacity, intelligence tests being directed to the discovery of the index, constant for a given individual, which expresses his particular grade of intelligence. A child's degree of intellectual *maturity* is expressed as a 'mental age.' As intelligence develops with increasing age, so will the mental age increase. But the child's intellectual *rank* can only be expressed by comparing him with the 'average' child, and the result of this comparison is termed the 'mental ratio' (i.e. the ratio of the child's mental age to his actual age) or 'intelligence quotient' (I.Q.). There now arises the question whether the I.Q. can be taken as that constant index which denotes the child's grade of intelligence.

Let us suppose that the influence of affective inhibitions frequently and markedly interferes with children's performances in the tests. How could this be detected in the results of the tests? Evidently by re-testing the same children after various intervals of time, some of the intervals being of considerable duration. We should then expect to find

¹ Cf. for example, Dr Godfrey Thomson's *Northumberland Mental Tests* (Harrap), and the present writer's *Simplex Group Intelligence Scale* (Harrap).

that the results of retests of the same child differed much from one another; for we could hardly suppose that the effects of the inhibitions were so nicely proportioned quantitatively as always to produce the same proportional (not absolute) effect at any age (thus leaving the apparent I.Q. constant so far as they were concerned), especially in view of the fact that at later ages a child is tested by questions wholly or partly different from those employed at earlier ages. On the contrary we should expect the interference of the affective factors to be quantitatively unequal, and more or less arbitrary, and hence to find irregular variations in the I.Q.

What is found in practice? The very opposite is the case. There is a large and growing amount of data which shows that the I.Q. of a particular child, as measured by the tests, remains practically constant within the limits of experimental error. Retests have been conducted under varying conditions, by different examiners, and after varying intervals of time (some of several years' duration), and all go to reinforce the conclusion that the tests give a nearly constant I.Q. for each child¹. There are no signs (except in markedly pathological cases) of the irregular variations which would inevitably arise from affective interference by inhibiting factors of the kind we are considering. Retesting therefore shows, not only that the I.Q. is at least a close approximation to the constant index aimed at, but also that affective inhibitions have at most but a negligible influence on the children's performances both in specific tests and in the scale as a whole.

We are thus bound to conclude that there is nothing in the nature of the tests themselves or in the results of their application which could warrant us in believing that affective inhibitions seriously interfere with the measurement of intelligence. At the same time we must end as we began by pointing out that finally conclusive evidence can only be obtained by retesting children after psychotherapeutic treatment. It is to be hoped that this important experiment may be carried out in the near future. Allied experiments of equal interest might consist in the application of mental tests during hypnosis, and also in cases of dissociated personality. In dissociations of the co-conscious type the comparison of the results of mental measurements made on the different personalities would be particularly interesting.

¹ The only general exception to this statement occurs with mental defectives (especially the lower grades) where a noticeable drop in I.Q. seems to occur with increasing age.

SUGGESTION.

By J. CYRIL FLOWER.

THE confusion which exists in psychological theories of Suggestion is due, no doubt, to a number of causes, chief among which is the fact that there is no common agreement as to the principle upon which definition is to be made. One method is to lump together certain kinds of reaction which are obviously similar, and to refer them without more ado to the capacious pigeon-hole labelled 'Suggestion.' This method is the carrying over of the rough and ready classifications of common sense into the field of psychology. What we mean in ordinary speech by suggestion is actually a group of mental operations and reactions which appear, as effects, to resemble one another. Thus if *A* in perplexity asks the advice of *B*, his question probably is, "What can you suggest?" And *B* is regarded as having made a suggestion, good, bad or indifferent, either (1) if he offers definite ideas, or (2) if by gesture, silence or other means, he insinuates something, vaguely or definitely. So a book or a play is said to be 'suggestive' either because it communicates fresh ideas and stimulates the thought and imagination of the public, or because it hints in veiled language at things which are more attractive in the disguise of innuendo than in the everyday garb of direct expression. The common element in these phenomena which are thus classed together as suggestion is the influence by one person or group of persons upon another person or group of persons which is exercised without recourse to physical force. Obviously if everything which comes under this broad heading is included under one term, the term will be so general as to have little or no value. A word that means too much may serve in common speech, where it can always be more nicely defined by its context, but it can only lead to hopeless confusion in science. If, therefore, the term is to survive in psychology, it must be defined by something which penetrates deeper than mere external resemblance. Accordingly there is a second method which proceeds by psychological analysis, and which aims at defining suggestion by reference to the psychological mechanism or mechanisms involved. But although psychologists are commonly agreed on the necessity of this exacter method, they are by no means agreed that its application leads to one precise and adequate definition

of Suggestion. Nor is the reason for this far to seek. Psychology is not a science of phenomena which can be isolated and studied as a self-contained group of interacting elements. Psychology has to deal with mind and its manifestations, and mind cannot be temporarily detached from the world while it submits to analysis and experiment but has to be studied in relation to the world upon which it acts, and which acts upon it. Thus psychological analysis depends for its results upon the point of view from which it is made. The academic psychology which largely held the field till recently was primarily interested in mental processes so far as they could be described and formulated by the methods of introspection and observation, the assumption being that what appears to be the character of a mental process for an intelligent observer, is its character. This whole assumption, however, was challenged by the application of the idea of evolution to mind, and profounder results were at once obtained by the comparative method, which substituted for the mere personal approach, the biological approach to the problems of psychology. A further contribution of vast importance has come from the study of mental disease and irregularity. The situation, therefore, is that psychology can hardly be looked upon as an independent science, but rather as a handmaid to the sciences. 'Pure' psychology is an abstraction; real psychology is as various as are the fields of experience in which mind is involved. Every psychologist must, that is to say, deal with mind in the concrete, in relation to some definite situation or set of conditions, and the point of view from which he approaches the subject will necessarily influence all his conclusions. Thus the philosopher who studies man as a 'rational animal,' the biologist who studies him as the most recent phase of an evolutionary process, and the mental specialist who studies him as a complex of forces which may easily get out of order and have to be set right again, will inevitably analyse the psyche and draw inferences concerning it from points of view so different and with interests so diverse, that it is not surprising that the resulting 'psychology' is not always coherent. The whole topic of suggestion is hedged around with precisely these difficulties. Rationalistic psychology does not much relish the facts of suggestion, and accordingly it dismisses such facts as it cannot otherwise dispose of to the realm of 'the abnormal'—one of those vague terms which covers a multitude of ignorances. Biological psychology welcomes suggestion, because it likes to discover how very irrational man is, and how nearly related therefore he is to the ape, the dog, the tiger and the jackal, and accordingly it gives the widest possible scope to the operation

of suggestion as a non-rational process. Psychotherapy knows the practical value of suggestion as a method of mental healing, and accustomed to the relation between physician and patient it tends to regard the essence of suggestion as being the conscious and intentional communication, with some measure of authority, of an idea or ideas by someone possessing prestige to a subject capable of being thrown into a receptive state by this means. When the systematic psychologist comes along and tries to present a synthetic view by combining the particular contributions of these various schools the result is practically a return to the common sense usage which is too vague to be helpful—what Dr Rivers described as “a tendency to make the scope of suggestion so wide as to include nearly every process by which one mind is acted upon by another mind, by an object of the environment, or even by itself (autosuggestion)¹.”

It is obvious that the facts of suggestion are far older than any psychological account of them; the existence of the word in common speech is sufficient evidence that they were at least in some measure recognised. In his contribution to the Symposium² on “The Relations of Complex and Sentiment” prepared for the Meeting of The British Psychological Society in Manchester, July 1922, Dr Myers wrote: “In order to reach greater precision, psychologists have attempted to change the meaning of these and other words in common use, but without paying enough attention to their current meaning or to the route by which they have come to acquire that meaning. It is too generally assumed that popular usage annihilates meaning. This is an error: it is always possible to define the words of common parlance, and it is of considerable psychological interest to study their significance.” To re-discover what may be called the nuclear meaning of the term suggestion in common speech would probably put us on the way to discovering what is the real and essential meaning of the word, which is what psychology as a science seeks. A deeper analysis of the common usage reveals at once the fact that the more intelligent or rational signification is secondary, and that the primary element refers to something surreptitious. The veiled hint, the ambiguous phrase or gesture, the tone of voice and manner of address vaguely intimating something behind the obvious, the symbolic act or representation—these and similar indirect modes of conveying influence are commonly regarded as the

¹ W. H. R. Rivers, Article “Psycho-therapeutics,” *Hastings' Encyclopaedia of Religion and Ethics*.

² *British Journal of Psychology*, XIII. 2.

characteristic vehicles through which suggestion operates. And the result of successful suggestion in this sense is the stirring up in the recipient of activities or tendencies which are not rationally conditioned. The influence is carried in under the walls of the citadel and escapes the watchful eye of the sentry. Religious ritual, for example, does not make its appeal to reason, but to what is sometimes called "the aesthetic sense" which means that it is suggestion acting through the senses directly upon organised conative tendencies built out of primitive instinctive material. This evasion of the critical reason is the outstanding mark of suggestion. How then does it come about that at the same time the word is used in common speech for processes which are of a definitely rational character? Why do we, when asked for an opinion, frequently call the ideas we elaborate a 'suggestion'? Why is almost any contribution, short of an authoritative enunciation of a truth which is by common consent beyond dispute, nearly always offered as a suggestion? The value of the term in these and similar contexts is in its tentative nature. We 'suggest' possibilities; while we issue instructions, and we declare demonstrated truths. Thus however sure we may be in our own minds that what we have to offer is right and true we frequently do not wish to give the impression that we are too sure. "I tell you this that you may read, mark, learn and inwardly digest it" is the attitude of the self-assured teacher to the disciple. "I suggest this to you...take it for what it is worth, and let it influence you as much as it may have power to do" is the attitude of the more tentative adviser or fellow inquirer; and the fact is that the more tentative communication often has the bigger effect, and it is probably popular insight into this fact that has led to the common use of the word in what seems at first sight to be so different a meaning. There is something more involved, in other words, than is obvious in the form in which the communication is made. We may roughly sum this up by saying that the popular use of suggestion implies that it is the method by which indirect mental influence is exerted. Direct mental influence is aimed at in the endeavour to convince through reason, and is successful when conviction is logically implanted. Indirect influence means that which passes through channels other than or additional to the channel of reason.

Most psychological discussions of suggestion start from this general conception, but very different conclusions are reached regarding such questions as the extent of the phenomena which may rightly be subsumed under the general heading, and what exactly are the mechanisms

involved in the process. It was chiefly through the therapeutic application of hypnotism, first by Braid, and still more by Liébeault, that suggestion became a matter of serious scientific investigation. Sir Francis R. Cruise¹ records the fact that Liébeault told him that as a young practitioner he had been greatly impressed by the influence upon patients of the expression of a very decided opinion by the physician, and he set about to discover how this influence might be exercised more directly and specifically. In the course of investigation and trial he discovered that in artificially provoked sleep, or hypnotism, the suggestibility of a patient was immensely increased. Accordingly Liébeault made use of hypnotism in order to facilitate treatment by suggestion; and this process was of course, the deliberate passing into the mind of the patient of beneficial ideas by the physician. These ideas, passing into the mind of a hypnotised person without reference to his rational volition, undoubtedly operate in a manner wholly different from that in which they behave if merely presented to and accepted by the logical reason of a person in the normal state. The idea of being better from some pain, when lodged in the mind of a person in a hypnotic state tends to bring about, more or less permanently, the condition of being better, just as the idea of inability to move a certain limb or of insensibility in a given region brings about the corresponding functional disability. From these and similar facts, combined with the theory of ideo-motor action, it was a natural conclusion for the therapeutic school that suggestion consists essentially in lodging in the mind of a patient an idea or ideas which shall be free from interference and inhibition by other ideas. Thus Janet says²: "In suggestion, each idea seems to develop to the maximum, to give all it contains in the way of images, muscular movements, and visceral phenomena. This *complete development* of all the elements contained in an idea is an essential characteristic of the phenomenon." For a normal person the development of his ideas depends on the exercise of attention and personality, but "In order that there may be suggestion, it is precisely necessary that all these normal causes of development should be wanting, and that the *idea should seem to develop to the extreme, without any participation of the will or of the personal consciousness of the subject.*" On this view we get a sort of penny-in-the-slot theory of suggestion. We put a penny into the machine, and if it is in good working order, and not already choked by

¹ Foreword to *Treatment by Hypnotism and Suggestion, or Psycho-Therapeutics*, by C. Lloyd Tuckey.

² Pierre Janet, *The Major Symptoms of Hysteria*, New York, 1907, pp. 282, 284.

other peoples' pennies, we shall draw from the machine our penny's worth of chocolate, or what-not. So if we put an idea into the mind of a patient, and this idea is free from competition with others, it automatically sets in motion the psychological and physiological machinery which issues in action. The same conception is expressed by C. Baudouin¹ in his account of the New Nancy School in the following words: "Suggestion is the putting into operation, by ourselves or by another, of the ideo-reflex power which exists in us all," and again by G. A. Coe²: "In deliberation there is mutual inhibition of two or more competing ideas....Suggestion, on the other hand, implies the absence, or relative lack, of such competition, inhibition and pause. All that is necessary is that attention should be withheld from some of the ideas appropriate to the given situation, and focussed, or 'narrowed down' to some one idea or coherent chain of ideas." According to this view suggestion depends upon (1) ideo-motor action—that is to say the theory that every idea naturally tends to pass into action; (2) the absence or inhibition of all other ideas which might interfere with or counteract the idea which is to be enacted. Now with regard to these two conditions Prideaux³ has already pointed out that "The term 'ideo-motor action' is a relic of the old psychology of ideas; for example, for Hegel, 'an idea is a force, and is only inactive in so far as it is held in check by other ideas.'" Analysis shews that it is not ideas that are active, but the affect which ideas may be the means of stirring up. In other words it is only such ideas as link themselves to interests or conative tendencies, which are emotionally toned, that tend to issue in action, and these interests and conative tendencies are capable of stimulation by other means than ideas—unless the word 'idea' is to be so extended in its meaning as to cease to have any specific reference. All definitions of suggestion, therefore, in terms of the communication of ideas are too narrow. They express at best only those features which are of interest and importance to the psychotherapist. Further, to quote Prideaux again on the second condition: "Suggestion has no capacity for inhibiting ideas, but, if we speak in terms of inhibition, is rather the consequence of the inhibition of inhibiting forces normally involved in volition." This is true only if suggestion is defined in terms of communicating ideas. If the process of suggestion is the setting in motion of conative ten-

¹ Charles Baudouin, *Suggestion and Autosuggestion*, translated by Eden and Cedar Paul, 1920, p. 26.

² George A. Coe, Article "Suggestion," *Hastings' Encyclopaedia of Religion and Ethics*.

³ E. Prideaux, Article "Suggestion and Suggestibility," *British Journal of Psychology*, x. March 1920.

dencies, whether through ideas or otherwise it is obvious that an essential part of the suggestion is the calling up of the conative tendencies in sufficient power to bear down the opposition of contrary influences. Unless this be done, the suggestion does not take place. But as against the point of view of the theory we have been dealing with this criticism of Prideaux is important. Ideas as such do not necessarily inhibit other ideas, but may merely complicate the mental content at any time, and therefore the mere success in communicating an idea to the mind of another will fall short of having the value of suggestion, unless that idea is, by reason of its content or associations, the spark that ignites the explosive charge of conative tendencies. Janet relates the following complaint of a patient, which admirably illustrates the point¹:

"A patient has sometimes answered me in a vulgar but quite characteristic way: 'Sir, I do not know the reason, but the thing did not take.'

'What do you mean? You did not understand what I said?'

'Yes, I understood quite well.'

'Then you do not wish to do that, you do not accept?'

'I accept all you please. I am quite ready to obey you, and I will do it if you choose; only I tell you beforehand that the thing did not take.'"

It is interesting to note that Binet and Féré², while sharing the ideational view of suggestion, yet lay emphasis on the secondary nature of the idea. "*La suggestion est une opération qui produit un effet quelconque sur un sujet en passant par son intelligence. Toute suggestion consiste essentiellement à agir sur une personne par une idée; tout effet suggéré est le résultat d'un phénomène d'idéation; mais il faut ajouter tout de suite que l'idée est un épiphénomène; prise en elle-même, elle est seulement le signe indicateur d'un processus physiologique qui seul est capable de produire un effet matériel.*" And "*la conclusion générale qui ressort de tous ces faits et de toutes ces expériences, c'est que la suggestion consiste à introduire, cultiver et renforcer dans l'esprit du sujet en expérience—une idée...elle consiste dans le renouvellement psychique d'une excitation périphérique que le sujet a déjà éprouvée. Dès lors on comprend sa puissance; l'idée, à proprement parler, n'est qu'une apparence; mais derrière elle se cache l'énergie développée par une excitation physique antérieure.*" We are not concerned to discuss the relation of mind and body, and therefore may leave aside the question whether "a physiological process alone can bring about a material effect,"

¹ P. Janet, *Major Symptoms of Hysteria*, pp. 284-5.

² Binet et Féré, *Le Magnétisme Animal*, Paris, 1887, pp. 128, 135-6.

but it is entirely in harmony with the point of view being developed in this paper to insist that the function of ideas in suggestion is to act as signals. But signals rather for what is essentially an instinctive process; and not all ideas are capable of this function, and, further, it is not only *ideas* that can set the instinctive machinery in motion.

Of the definitely therapeutic school of psychologists Freud¹ comes probably nearest to the social and biological point of view, in his doctrine that suggestion is transference, or more accurately stated, that "suggestibility is nothing else but the tendency to transference." Transference, which is "the radiation of Libido towards other persons in object-investment" is a natural capacity in all persons, and therefore suggestibility is normal and potentially universal. The way it works (as positive) is to endow the person to whom the transference is made with authority; it "transforms itself into faith in his findings and in his views." And "faith repeats the history of its own origin; it is a derivative of love and at first it needed no arguments." Consequently the person on whom the libido is fixed is a perpetual and prolific source of suggestion to the subject, precisely because his reason is in abeyance, and his instinctive tendencies are in a state of heightened activity. There are two points that call for comment here: (1) Freud's use of the term 'libido' as equivalent to 'sexuality,' which might seem to be artificially limiting the range of those conative tendencies which are the ultimate power-house of suggestion. This point is of no great importance, however, if we remember that Freud practically means by 'sexuality' the whole range of instinct energy, and not merely 'adult sexuality.' Jung, of course, definitely uses the term for psychic energy, or force, which flows along the channels of the special instincts². (2) Freud lays strong emphasis on 'faith' as the characteristic element in suggestibility. It is perfectly true that faith does increase suggestibility (or at least may do so), but it is not true that faith and suggestibility are the same. Faith is characterised by a conscious mental activity (whatever other elements enter also into its constitution) which is conspicuously absent in suggestion, and the process of suggestion as such does not necessarily involve faith at all. Faith, which is to be absolutely distinguished from blind credulity (which may probably be the result of suggestion) is a conscious and intelligent state of mental activity; suggestion essentially is an unconscious and instinctive reaction to certain kinds of stimulus.

¹ Sigmund Freud, *Introductory Lectures on Psycho-Analysis*, translated by Joan Riviere, 1922, pp. 372-3.

² C. G. Jung, *Psychology of the Unconscious*, translated by Beatrice M. Hinkle, 1919, ch. II.

McDougall¹, though he approaches the problem from the social point of view, makes the same mistake. His definition, which is perhaps the best known and most widely accepted, is: "Suggestion is a process of communication resulting in the acceptance with conviction of the communicated proposition in the absence of logically adequate grounds for its acceptance." There is not necessarily any question of conviction involved in a process of suggestion at all. It would not be correct to describe the state of mind of a hypnotised subject whose right arm has been rendered anaesthetic by suggestion as 'conviction' about anything—the state of mind is really one of domination by an influence outside the range of consciousness. It is, indeed, very largely the fact that there is an absence of conviction and of the power to have convictions, that constitutes suggestibility in this case. What McDougall presumably means is that the subject of suggestion behaves in regard to what is suggested as other persons might behave if they were deeply and profoundly convinced. It is quite possible to recognise that there are no adequate grounds for the acceptance of some article of religious faith and yet to determine to believe that article of faith because you would rather it were true than false, but such acceptance is not the result of suggestion. Religious faiths do actually get accepted by suggestion, but the people who are most suggestible are those with few settled convictions, and what results in their minds cannot be called conviction; it is obsessional opinion. You only have a feeling of conviction about something which has involved some measure of mental effort to gain; what arrives through suggestion is beyond all feelings of this character: it is altogether taken for granted, rooted in the ultimate reality of things. While in this direction McDougall is too wide in his definition, in another he is too narrow, just as the psychotherapists tend to be. Suggestion is very frequently a process of communicating propositions, but it is not only this. Indeed proposition would seem to be narrower than *idea* which has already been criticised as inadequate. The trouble with all the theories so far considered is essentially that they look upon the problem not only from a purely human point of view, but from a partial human point of view, emphasising those aspects of suggestion which most naturally lend themselves to the conscious manipulation of the physician.

Once it is realised that suggestion is not a rational process it is natural to conclude that it is not a merely human phenomenon, and that when physicians or others make use of suggestion for therapeutic purposes they are really setting in motion a mechanism which has or has

¹ William McDougall, *Social Psychology*, 2nd ed. 1909, p. 97.

had some biological function to play in the evolution of mind as part of life as a whole. If so what is essential in the process will be that which is common to lower forms of mind and the human, not what is characteristic of the human, complicated as that inevitably is by the presence and operation of free ideas and reason. Dr Rivers, approaching this and other psychological problems from the point of view of a happy combination of the therapeutic and the anthropological interests, definitely attempted to account for suggestion in terms of its biological function, and this led him to define it (so far as he regarded it as 'definable¹') as 'a process or mechanism of instinct².' In *Mind and Medicine*³ he said: "I use the term for a process which belongs essentially to the instinctive side of mind. It is the representative in Man of one aspect of the gregarious instinct, the instinct which makes it possible for all the members of a group to act in unison so that they seem to be actuated by a common purpose. According to this view it is a process which differs essentially in nature from those mental processes which produce uniformity of behaviour by endowing the members of a group with a common idea or a common sentiment. Its activities lie definitely within the unconscious sphere, so that when the physician employs suggestion consciously, he is using in an artificial manner an agency which belongs properly to the region of the unconscious." Accordingly "...it is convenient to use the term suggestion...as a comprehensive term for the whole process whereby one mind acts upon another unwittingly⁴." The gregarious instinct, Rivers maintained, is one which came into existence "in order to produce and maintain the cohesion of the group" and "the essential function of the gregarious instinct is that it shall lead all the members of a group to act together towards the common purpose of furthering the welfare of the group⁵." Thus just as the sex instinct acts within a given individual in such a way as to make it peculiarly sensitive to the presence of an individual of the opposite sex of the same species, and to stir up feeling and activities which normally end in union, without there being any definite idea of sexual union, so we are to suppose that the gregarious instinct acts within any

¹ W. H. R. Rivers, *Instinct and the Unconscious*, 2nd ed. 1922, p. 93, says: "As soon as we recognize that suggestion is essentially a process of the unconscious, and that its different aspects also have this nature, we have to renounce the clearness of definition which is possible in the case of the processes and products of consciousness."

² *Ibid.* p. 91.

³ *Mind and Medicine*. A lecture delivered in the John Rylands Library on the 9th April, 1919, 2nd ed. 1920, p. 17.

⁴ Rivers, *Instinct and the Unconscious*, p. 91.

⁵ *Ibid.* p. 90.

individual of a species in such a manner as to render it peculiarly sensitive to the presence of the group as a whole, and to stir up feeling and activities which normally end in action of that kind which is in the interest of the group as a whole. This sensitiveness to the group presence and the tendencies to common or harmonious action which are initiated is suggestion in its essence, unqualified by the various additional factors which arise from the operation of free ideas and reason.

The same view is accepted and worked out by W. Trotter¹. For him suggestibility is essentially sensitiveness to the voice of the herd, a characteristic which is indispensable to the homogeneity of the herd. Every member of the herd tends to follow the lead of other members, and in turn to act as leader; but the leader who is most representative of the normal will be the most followed. Looking at this, so far as possible, from within, and assuming a species thus instinctively endowed and also self-conscious, it is clear that "impulses derived from herd feeling will enter the mind with the value of instincts—they will present themselves as '*a priori* syntheses of the most perfect sort needing no proof but their own evidence².'" This feeling will not be limited to specific acts, but will be characteristic of *any opinion derived from herd suggestion*. We are thus led to see that suggestion is not a peculiar process which happens only when we are dealing with abnormal people, but as we know it, in its various forms, it is still the same essentially instinctive mechanism which operates throughout the wide field of animal mind, only modified and artificialised by the interaction with it of other and later developed mechanisms of mind. The physician, the priest, or the orator who communicates ideas or stirs up feeling and action through suggestion is stimulating the psychic traces of the gregarious instinct in those upon whom he practises, though he may also be skilfully combining other methods of influence with that which is rooted in instinct. The growth of intelligence indeed renders it difficult to present a case of pure instinctive suggestion, for in all experiment, whether in therapy or in a laboratory, the process is no longer of the unwitting character which it is in its simplest and most elementary form. Even the widespread phenomena of herd suggestion to which Trotter points in the everyday life of modern society do not display the process in the quite unwitting form; there is a good deal of witting manipulation on the part of 'leaders' of public opinion, and a good deal of 'faith' on the part of many who are the subjects of suggestion.

This interpretation of suggestion will be found to cover all the actual

¹ W. Trotter, *Instincts of the Herd in Peace and War*.

² *Ibid.* p. 30.

facts of suggestion as they appear in human society, and also to link these facts up with that larger range of facts which is involved in the thoroughgoing application of the doctrine of evolution to mind. It is impossible to attempt to demonstrate this in detail within the limits of this paper, but reference may be made to one outstanding question which is frequently discussed, but which cannot be answered by reference to any objective standard on the merely therapeutic or abnormal theories of suggestion. Why are there the remarkable variations which experience presents us with in suggestibility? In view of all the facts the reply that it is a sort of mental disease or weakness is no reply at all. We are all suggestible, more or less. The majority of us are far more so than less. If we judge by mere numbers and apply the term 'abnormal' at all those who are most indifferent to suggestion are the abnormal people—which only shews, incidentally, as Trotter has insisted, how futile the term is as ordinarily used. But once the essential fact is grasped that suggestion is an original mechanism of the mental equipment, it becomes simply a matter of psychological analysis to trace the course by which this original mechanism is overlaid and modified by the growth of intelligence, and the building up of instinctive and emotional raw material into organised sentiments. The tendency is for suggestibility in general to decrease in proportion to the increase of general education. In the language of Freud the more the libido is directed towards objects which form a rational system, so that mental energy is being usefully and intelligently expended, the less libido is available for being side tracked by suggestion. But there are few who can claim that the whole of their mental activity is satisfactorily engaged upon a completely rational system of ends or purposes, and therefore there are few who are not in some measure, and at some point liable to suggestion. The variation of suggestibility in different persons thus depends upon two main factors: (1) the amount of instinct energy with which they are endowed, (2) the extent to which this energy in any person is under the guiding control of organised sentiments and rational purposes. The ordinary person is only rational in some few more or less specific directions. He may be rational in his business, but wholly irrational in politics, religion and so forth, and consequently suggestible in these directions. Consequently the only way to eliminate suggestion altogether would be to eliminate ignorance altogether. Until such time all members of the human herd will be suggestible in varying degrees, the variations depending on the extent to which reason is actually and continuously at the helm.

FREUD'S THEORY OF WIT.

By J. Y. T. GREIG.

It is my purpose to examine certain opinions on wit set forth by Professor Freud in his masterly *Wit and its relation to the Unconscious*¹. His theory, like most of his other contributions to psychology, has been misrepresented, not only by hostile critics, but by friendly interpreters as well. It is a theory very easy to sum up in a catch phrase, and the temptation to sum it up in this way has been too strong for one at least of the Freudians, Mr E. B. Holt, who, in the attempt to be bright and interesting to the general reader, has succeeded in being grossly inaccurate. Writing in *The Freudian Wish*, he says: "After reviewing the long list of theories and definitions of humor, which is as dense a jungle of misconception as anywhere exists, Freud caps them all with his simple formula that *every form of wit or humor* is nothing but a means of 'letting the cat out of the bag².'" A mere glance through Freud's book should have been enough to make it clear that his distinction of wit, the comic, and humour, one from another, is fundamental, that 'letting the cat out of the bag' is not a suitable formula for his views on either of the two last—though Holt speaks of 'every form of wit or humor'—and, what is more, that if it is a suitable formula at all, it can be applied only to what Freud calls tendency wit, and not to what he calls harmless wit. We are not concerned here with Freud's conclusions on the comic and on humour, but only with his theory of wit. But in view of such misrepresentations as that of Holt it is important to make clear at the outset what his theory of wit is not. It is not a theory of laughter, or of the comic, or of humour; it is exactly what it sets out to be, a theory of wit.

Freud classifies wit under two main headings, harmless wit and tendency wit. Harmless wit is its own end; it serves no purpose beyond itself; it is not aimed; it manipulates thoughts or words for the mere pleasure of such manipulation. This pleasure Freud concludes to arise from economy of psychic expenditure. A detailed examination of the techniques of wit—an examination that cannot be followed out here—leads him to the

¹ All quotations are from the English translation, by Brill.

² *Op. cit.* p. 17; italics mine.

idea that the common factor in them all is economy. "A compressing or—to be more exact—an economic tendency controls all these techniques¹." Even harmless wit, however, is not the first stage, for in harmless wit which would be recognised unmistakably for what it is, as distinct from mere play or jest, the thought expressed has been fortified in some degree, as Freud puts it, "against the impugnment of the critical judgment²." To be effective at all, a harmless witticism must say, or appear to say, something a little out of the ordinary. Nevertheless—and this is the point in Freud's theory on which I wish to fasten—it is a mistake to look for the source of the pleasure in the content of the witticism; "we are forced to connect the feeling of pleasure with the technique of wit³," with technique, that is to say, the characteristic of which is economy.

Wit of the second kind, tendency wit, makes use of the same techniques as harmless wit, and thus depends in part on the same sources of pleasure. But in addition it is enlisted into the service of more or less repressed tendencies, sexual or hostile, which succeed in getting past the censor by its means and so obtain indirect satisfaction. The pleasure of tendency wit is thus doubly conditioned; on the one hand by technique, and on the other, by the sexual or hostile tendency it satisfies. Tendency wit is aimed, at a person, or at a group. At the same time, the principle of economy reappears in a new form. Psychical expenditure is saved by the removal or the eluding of moral or social inhibitions which would have prevented the tendency from coming to expression in any but a witty form. Holding fast to this principle, Freud, at the end of his book, sums up his theory of wit in a sentence, "It has seemed to us that the pleasure of wit originates from *an economy of expenditure in inhibition*⁴."

That is the theory of wit in outline, as I understand it.

Now since there is much in this theory with which I am in serious disagreement, it is well to say frankly at once that I am in almost complete agreement with what I take to be the most important part of it, namely that dealing with tendency wit. Working at the same subject from another angle, I have come to certain conclusions in relation to laughter which I do not mean to discuss at present but which have at least this merit, that they fit well enough into Freud's theory of tendency wit. I believe it is incontestable that tendency wit is always serving either a hostile or a sexual impulse—using the term 'sex' in the broad

¹ Freud, *op. cit.* p. 50.

² *Ibid.* p. 211.

³ *Ibid.* p. 135.

⁴ *Ibid.* p. 384; italics in text.

sense in which Freud uses it. But I do not intend here to make any attempt to prove this belief. I have nothing to say that Freud has not already said much better.

The trouble lies further back. The whole conception of harmless wit is elusive, and in the last resort, I conjecture, untenable. Is there any such activity? Can we give any proper psychological meaning to the notion of words and thoughts being manipulated for the pleasure of such manipulation? Is not harmless wit, like tendency wit, aimed, even though vaguely and uncertainly? These are the first questions to be asked, and they all arise ultimately from suspicion of the manner in which Freud, and still more the Freudians, use such terms as 'pleasure,' 'fore-pleasure,' 'the pleasure mechanism,' 'the pleasure principle,' and so on. For the purposes of psychotherapy the vagueness with which the psycho-analysts speak of pleasure and pain (displeasure) may not greatly matter; it matters for the purposes of what may be called pure psychology. We all know, from the recent writings of Dr Jung and his followers, to what lengths—I nearly said depths—initial vagueness in conception may lead in the end; and it is much to be desired that the concepts of pleasure and displeasure,—and still more the concept of 'affect,' which is hopelessly confused—should be given more precision in the writings of Freud and Jones and Brill.

In the next place, suppose it to be granted that the technique of wit depends on economy of psychic expenditure: why should this be pleasant? Can we ever get pleasure out of not-behaving? But is there any such economy to be observed in the behaviour of wit? Does the technique not actually force us to the exact opposite of economy, increased expenditure of psychic energy?

Pleasure, it may be shortly said, is the feeling equivalent of successful behaviour, displeasure the feeling equivalent of unsuccessful (obstructed) behaviour. But how are we to tell successful from unsuccessful behaviour, apart altogether from the feeling which values it? Admittedly it is no simple matter. Successful behaviour is that which is moving, comparatively without impediment, towards its end-result, which is contributing towards the purpose we have found by observation that such behaviour is designed to serve, or, at least, does actually serve. To be able to attach the adjective 'successful' in any particular instance, we must obviously have first classified behaviour into kinds, marked down an end-result for each kind, inferred its purpose from that end-result, and referred the particular instance to its appropriate kind. Everything depends on the classification we start with; this may be made, so to speak, in plan

or in cross section. The older psychology made it in plan, and chose a top floor. On such a classification there was nothing palpably absurd in the notion of 'thinking' providing its own 'end,' and being productive of pleasure on its own account. The relics of this classification are still evident in the works of many psychologists who have ostensibly given it up in favour of a classification in cross section, a classification that begins with instincts, instinctive tendencies, or whatever other class-name may happen to be selected, and that marks out these native ways of behaving in the form, as it were, of pillars and buttresses, with the whole structure from basement to roof staying itself upon them. One result of the modern classification is to change our ideas of 'thinking.' 'Thinking' ceases to be an activity functioning in its own right, and becomes a 'form' which any native impulse may take, on the upper floors. It is then no longer accurate, in psychology, to speak of thought being an end in itself, or of thought bringing pleasure on its own account. The end of thought is the end or purpose of the particular instinct, or combination of instincts, of which it is for the time being the behaviour, and the pleasure of thought is the pleasure of the successful functioning of that instinct, or combination of instincts. Thinking about love, for instance, is love behaviour in the form of thought. It is love behaviour on an upper floor, no less certainly than seizing and embracing a woman is love behaviour on a lower floor. There may be a great deal more to be said of it than that, but it is of the utmost importance, both theoretically and for the practice of psychotherapy, that we should recognise the fundamental identity of the more primitive with the genetically higher behaviour.

Coming back to our starting point, harmless wit, we can now say bluntly that manipulation of thoughts for their own sake is a mythical activity. It is as mythical as playing a competitive game for the sake of the game—a supposed ideal which some sentimentalists urge on unresponsive schoolboys. Thoughts are manipulated for the sake of achieving some purpose recognisably identical with the purpose of instinctive behaviour on more primitive levels. So far as wit is concerned, the purpose is generally an aggressive one.

Manipulation of words is similar. Words are bandied about because of what they stand for, because they are substituted stimuli of behaviour.

It may be objected that all this is purely speculative. Let us take an example, then, from Freud, of supposedly harmless wit. It is difficult to find one that is not manifestly aimed *at* somebody, but perhaps the following is less obviously aimed than the others.

“Commenting on the saying, ‘Never to be born would be best for mortal man,’ the *Fliegende Blätter* remarked, ‘But hardly one man in a thousand has this luck.’”

Let us attempt to analyse our behaviour on first reading this witticism. Arrived at the end of it, we have a moment of puzzlement, and either re-read or recall the initial statement that elicited the editorial comment. We now realise, what we almost certainly failed to realise in the first hurried reading, that this initial statement, this supposed apothegm, for all its solemn air of melancholy wisdom, is specious and absurd. The editorial comment has shewn it up, just as the editorial comments in *Punch* shew up instances of ‘Commercial Candour.’ Now it is worth while to note in passing one subordinate effect of the *Fliegende Blätter*’s exposure, which has, I suspect, some part in the total effect of the witticism. ‘Born’ is a word rubbed so smooth with constant use that it slips easily past us without inducing us really to think of the act of birth. The editorial comment throws us back to it, fixes our attention to it, if only for an instant, and compels us to realise more precisely what ‘being born’ means. In other words, our attention is momentarily directed to a sexual fact, previously slurred over. It is only momentary; but it counts. The next movement of thought, however, is more significant. If we happen to know who was the author of the wise saw, we immediately think of him; if, as is more probable, we do not know who he was, we immediately become conscious of a passing wish to know. The question, ‘Who said it?’ may well remain unspoken, yet it is a hundred chances to one that it will frame itself in the mind. This seems to indicate that we are, in however vague and uncertain a fashion, trying to *aim* the witticism. It is aimed at a dim and composite figure, made up out of our previous experience of would-be philosophers of life, and we should be glad to be able to give this dim, composite figure a clearer outline by naming him. We are all made uncomfortable by the abstract; we tend to provide it with at least a skeleton, if not always with flesh and blood. And never more noticeably than in the activities of wit. Other things equal, we relish a witticism better if it is attached somehow to a person or a group of persons we already know something of, and, if our knowledge is incomplete, we do our best to supplement it by lending to the victims enough vital qualities to give them the appearance of life. The difference between harmless wit, so called, and tendency wit, is a difference only in the degree of precision to which we are able to bring our behaviour. In the former, the hearer has more to do on his own account, in the latter, the author helps the hearer out by choosing as the victim of

the witticism a personal acquaintance, an historical character, or an easily recognised professional or social type.

The second group of questions we asked above, related to the alleged economy of psychic expenditure, the common result, on Freud's view, of all the techniques of wit. According to the theory of pleasure already hinted at, pleasure is the feeling of, or in, relatively unobstructed, positive behaviour, and it is impossible to understand therefore how pleasure can ever result from the absence of behaviour, from not doing something which might have been done. The term 'economy,' in fact, is unfortunately chosen. There is no pleasure whatever to be got out of the mere saving of £100; what is pleasant is the positive behaviour of spending or hoarding, actually or prospectively, the £100 saved. Present economy of psychic expenditure, if it is legitimate to speak in this way at all, is valuable only in so far as it prepares for, or makes possible, future psychic expenditure. It is the future expenditure which may—or may not—be pleasant and, apart from *that*, and from the anticipation of *that*, the mere saving of the expenditure *now* is absolutely indifferent. It is not behaviour; it is the absence of behaviour.

Nor has it ever been suggested, so far as I know, by Freud or anyone else, that the secret of the enjoyment of wit *now* is really anticipation of something that will be done *in the future*.

The truth is that there is no such economy of psychic expenditure in wit. Words are economised, certainly, but there is no such correlation as Freud supposes between the one kind of economy and the other. He himself admits that the economy is often more apparent than real. It reminds him "of the manner in which many a housewife economises when she spends time and money to reach a distant market because the vegetables can there be had a cent cheaper¹." Exactly; the comparison is apt, and it virtually cancels out all the rest of what Freud has to say on economy of psychic expenditure. Take, for example, the play on words. Here one word does duty for two ideas, or, to speak more accurately, two words with the same sound are merged into one. Freud's best example, a very good one, is the famous witticism levelled at Napoleon III, when, immediately after coming to the throne, he confiscated the estates of the House of Orleans; someone said of this act, 'C'est le premier vol de l'aigle.' Now it is to be remembered that Freud insists on the independence of the wit technique, as a source of pleasure. In the present instance he would say, apparently, that we obtain pleasure not merely from the satisfaction of the hostile tendency against Napoleon III,

¹ Freud, *Wit and its relation to the Unconscious*, p. 52.

but also from the form into which the witticism is cast. The bridge of the witticism is the word 'vol,' and, so far as I can make out, Freud would argue that by means of this bridge we pass easily, 'economically,' from the idea of flight to the idea of theft. But examination of our behaviour does not bear out this argument. The witticism was made for people accustomed to French as their native tongue, that is to say, for people speaking and hearing French words almost automatically. Now the fact is that adults, in ordinary conversation and still more in reading, normally hear words of their own language without really listening to them. They have got the habit so firmly set of making straight for the meaning of the words, and fixing their attention there, that the sound of the words practically escapes attention. The sound is acted on, but not attended to. And if, for any reason, we deliberately attend to the sound of the words—if, for instance, we are phonetists, like Higgins in Mr Shaw's *Pygmalion*—it is probable that we shall allow the meaning of a great many of the words to escape attention in the same way. To attend to both sound and meaning at approximately the same time requires effort, sometimes considerable effort, as we quickly discover when we are listening to a conversation in a foreign language in which we are not very fluent. And the characteristic thing about the play on words, as about all forms of wit which depend in some measure on the sound of words, is just that we *must* attend, at approximately the same time, to both sound and meaning. It is not enough to attend to sound alone, since, manifestly, wit must always be *understood*.

It would seem, therefore, that the exact opposite of what Freud maintains is true of wit; instead of economising psychic expenditure it demands additional psychic expenditure. And this is in accord with the fact, sufficiently notorious, that wit is unusually fatiguing. There is no more exhausting companion than the novelist who is always scintillating.

Freud has confused brevity with economy. Wit must be brief and 'to the point,' not in order that we shall be saved labour, but, on the contrary, in order that our labour may be increased. The witticism is compressed in order that it may be rather more difficult to understand. Ordinary speech has regular ways, to which we grow accustomed, of marking the connections between ideas. In wit these connections are not regularly marked, and we have to make good the deficiency ourselves. Strictly, that is equivalent to obstructing our behaviour, and therefore a cause, not of pleasure but quite definitely of displeasure. And if the compression is so severe that the witticism fails to be understood in the end, it remains a source of displeasure. But the final understanding of

the witticism saves us from this fate. Pleasure and displeasure are complementary feeling elements; without displeasure there is no pleasure; and pleasure increases in intensity in proportion to the amount of displeasure (the result of obstruction) it has to overcome, provided it does overcome it. If the understanding of a witticism, within a reasonable period of time—undue delay allows interest to be dispersed—enables us to satisfy some sexual or hostile impulse, then the more effort we have had to put forth in the process to get over obstructions, the greater will be the feeling of pleasure in the total behaviour. But pleasure comes from effort, not from the economy of it.

ONE HYSTERIC AND "MANY PHYSICIANS,"
OR
AS OTHERS SEE US.

[The following letter, the authenticity of which is vouched for by Dr Millais Culpin, was received by a lady in England from a friend in Canada. A few passages referring to private affairs have been deleted. What is here printed conveys a lesson to all who have to do with those patients who, more than any others, suffer much at the hands of many physicians. ED.]

Feb. 6th, 1921.

My dear —,

I came home from camp in August 1919, feeling that recovery was not far away. I am not sure what happened, but the news of Mr —'s death in September seemed to start a backward trend—not apparent perhaps to every one, but to me it seemed the very best thing in my life had suddenly gone. His letters kept up a living touch, and I just longed to get home and see him again. However, from then I had the most terrible time; in the November Dr H. said he could not bear to see me for three minutes, much less go through with it as I was, week after week. It was then we started to use chloroform for the attacks, and oh, the relief!—Here was something which acted instantly, whereas morphine took at least $\frac{3}{4}$ of an hour, besides which, knowing the tendency of morphine, I only dared take it when life itself was threatened.

From then on I could not get out of bed; excessive trembling, cramping, and heart thumping almost to suffocation; but comparatively easy in between if I remained in bed and just whiffed chloroform if I had to see folk. In March 1920 I had another terrific attack, so violent that I simply tore J.'s waistcoat etc., as the cramps twisted and turned me. Well, he thought I was going home, that time. And the nervous shock knocked him up; for three weeks he was in bed. Since then I have never been without chloroform and morphine at my bedside.

Then came the moving, through which I got fairly well, except that in going a few steps from the auto to the house I once more almost died. I had whisky in one pocket and chloroform in the other, and as J. was trying to carry me up the stairs, perfectly upright and stiff as a tree trunk, I could not breathe and tried to whisper "Whisky"; instead of which a spasm sent it out with a yell, "WHISKY," which, as we were then in a prohibition town, had its funny side.

However, I eventually got landed indoors and into bed, and have not been down the stairs since, except for an ambulance trip, to which I am leading up.

Now dear —, do not, for one moment, imagine me a poor suffering piece of humanity, but think of me very much as of yore; saying the most atrocious things and having a good deal of funny times, but with such a subconscious self always at work that I might make the most absurd joke, and go perfectly

rigid, and have chloroform, all within two or three seconds. Once, after a very bad attack, while J. and Dr X. were watching so anxiously (but I know the second the worst is over, by the relaxation) I said, "Doctor, what will you call this on the death certificate?" He looked startled, and said, "Why," so sympathetically anxious. "Well, because I have just read that Cromwell died from Tertian Bastard Ague, and I don't want anything like that." Well, in a second we were all laughing. "But," said Dr X., "No, I call it Decimated Sclerosis of the Spinal Cord"; so there you have it, up to Aug. 24th, 1920.

Then some of our doctors from overseas came back, and once more Dr X. got busy trying to find someone who might know more about it. First we had a germ specialist, and had a blood test—everything negative. So there was no tuberculosis, or any trace of disease. He said, "Muscular, absolutely,—will probably leave her as suddenly as it came." I forgot to tell him it had been a long time on the way.

He, in turn, was so much interested that he wanted another returned doctor, at present President of the — Medical Society, to see me. He came (Dr B.) and put me through all nervous tests, chloroforming whenever I was too bad. He was inclined to Dr X.'s view of the spinal cord, but would say nothing, as none of the nerves seemed worn out,—even to the extremities of the toes they responded all right when I was lying down; but neither doctor attempted to stand me up, although I told them that I could, if they weren't there. Well, Dr B. had met XYZ. overseas, and had invited him to — (Consultant Neurologist to —. Practically the highest authority on nerves in the realm). He was sure XYZ. would be interested, as it was so extraordinary. In a few days I went to the hospital in the ambulance, just chloroforming all the way. I couldn't pretend to tell you the horror of the nurses at my daring to have chloroform, and they walked the bottle away, but how they came back on the double quick with it, and how all the doctors left me to it! They did not know who I was; at first I was entered as Dr B.'s patient, and when I tried to explain that I was not there for ordinary treatment, but was privileged as XYZ.'s patient, they all thought I was more than a little touched.

However, Dr B. came in that afternoon, and I was left in peace until Dr X. brought in XYZ. next day. Well, all the morning I almost prayed Dr B. would be with them—but he was so afraid that I should be a little more at ease with him, and he wanted me at my worst, so he stayed away, for which I was *very very* thankful afterwards. Dr XYZ. shook hands, I put on my very nicest smile and said, "Good morning, doctor. It is very good of you to spare your valuable time to bother with me." "Not at all, Mrs P., if I can do you any good." By this time my sweetest smile was gone, and I was panting like a dog on a summer's day, and jerking away up the bed. Dr B. had purposely refused to give Dr XYZ. any history, so that all his diagnosis would be quite unbiassed. "Tell me, Mrs P., how long have you been like this?" "Five years."—"Five years you have been like this, but not like this all the time?" "No —, only if I see people, or if I attempt to do certain things; for instance, if I go to make a cake I can put all the ingredients together, but immediately I go to mix it I go perfectly rigid and cannot move; or perhaps for weeks I can walk about the bedroom, but if I go to step outside the bedroom (even though I count 20 steps across the bedroom and say, 'Well, if I can do 20 steps in the bedroom I can do it in the hall') I cannot; I go into these attacks. And this is nothing; as a rule I tighten so that life itself is threatened." (All this between gasps and spasms

at about a word a minute.) "Tell me the first time this happened—had you not some sort of serious illness or trouble? No?—now Dr B. this is brain storm. Tell me, Mrs P. just what happened." "Well, I was going down the road and passed, or rather saw, two men walking on the sidewalk; I went perfectly rigid and could not pass them. They saw I was ill and asked me into a store, but I said I thought it was just cramp. By that time I was better, and so walked on to the doctor's office. I told him what had happened, and he brought me home in his car. Since then I have never seen anyone without going perfectly stiff when up, and jerking and twisting like this when in bed." "And do you mean to say that you were perfectly all right when this happened?" "Yes." Once more I went through every kind of nerve test. Then he turned to Dr C. and asked for a nurse. "Now Mrs P., do you think you could stand up?" "Perhaps I could, if I chloroform, and get this attack quiet." "No, we want to see you as you are. Nurse, take everything off Mrs P., put on just a triangular bandage....Now, Nurse." Well, it was a free fight for all to get me off the bed, but when I was partly raised he swung my feet to the floor, he taking one arm and the nurse trying to get the other.

I was knotted from head to foot; every muscle to its utmost. The head and trunk forwards, knees turned right in, knock-kneed and strained up, with only the two big toes touching the ground. As to move, it was impossible; I clutched his tie and waistcoat, and he forced me all along the private ward (this took about 20 minutes for 20 yards). "Dr B., this is absolutely the typical *up-on-the-toes* of shell-shock, you have seen the men like this,"—pointing to muscles here and there. When we made no progress he would slip his foot behind my leg and try to kick it forward with his full strength. It would advance about 2 inches. Then I began to scream—not me consciously—but an unconscious shriek like a drunken woman.—"Reflex hysteria." Eventually I got back to bed. The relief was so great that I relaxed instantly, and looked up to say something, but I saw XYZ's face simply streaming, soaking wet, and his clothes all over the place (the water had been trickling all down my chest and back in streams from the exertion). He was patting my shoulder, so I forgave him and once more smiled. "Doctor, I am so sorry, it has made you as hot as it has me." "To be sure it has," he said...."Now, Mrs P. I must tell you you will get well. This is brain storm, exactly the same as shell shock. Not brain disease, mind you, in any shape or form." I told him about the lordosis (spinal curvature) making the doctors think it was sclerosis of the cord. "No, the curvature can't be helped, of course, but the cord is *quite* all right. Treatment along the line of suggestion, etc. Take her out there and treat her the same as the men; let her see hundreds of people, and she will be well in no time." (I don't know where *there* was.) "She is a sensible woman, it is not like treating an ordinary woman, she is extremely sensible and well controlled."

"Doctor, if you call this control"—"Yes, but Mrs P., all this is subconscious; you cannot help this. It is incredible that a woman like you should go under." I thanked him.

Later, Dr B. came, and when I told him he laughed and laughed. He imagined a typical high-brow, and thought Dr C. would have all the fuss, and XYZ. look on and comment. "What did Dr X. do?" "He just stood with his hands behind him, against the wall; so did Dr A."

Well, that night there was to be a clinic of seven patients, two hundred doctors and nurses. I was to be one. Can't you imagine what I thought, and

every now and then the nurse would come in to know if I had had word. It came at last; they thought I had been through enough for one day: I need not go to the clinic—the *Te Deum*.

Now, what was gained? Well, just that the danger to the spinal cord being eliminated I could force myself to do things, and having the chloroform at hand, even if a severe attack was induced, I could soon get it under. So I made a little headway, getting round the house.

Next for suggestion. A very typical French doctor was doing splendid work at the hospital, so Dr B. interested Dr F.

He came—imagine the pictures in the comic press! Pinched suit, violet hued tie, shirt and socks perfumed, marble glazed forehead and French beard.

"Now, Mrs P., you know what is the 'Heepnosis'—I shall send you to sleep, but you must give yourself to me entirement—you must be willing to do just what I say, you must make your mind a perfect blank and follow only what I say—are you willing to do this?"

With some idea that I was getting married over again I nearly said "I will." I caught J.'s eye twinkling and pulled myself together in time to get in a few questions; then J. was ordered out of the room.

"Look at me, keep your eyes fixed on me, don't think of anything, let your mind be a blank, look at me, you are going to sleep a deep sleep, you are getting drowsy, so drowsy, you are going to sleep, sleep, sleep, sleep, a sweet sleep, a deep sleep."

Twenty minutes of it, and he never once blinked an eyelash—*Nor did I*.

"A hard case, a very hard case": J. came in. "She is a very hard case, but I will come again. Next time she will be more prepared; she is like the pubeek, she is what you call him"—he meant incredulous. J. got the twinkle in my eye this time and volunteered the word—'frivolous.' "Yes, she is the frivol, but I shall conquer."

Again he came. "I shall use the other methods if you do not give yourself in abandonment this time." "On my dignity Doctor, I am not fooling or incredulous. I should not ask you to come if that were all." (I had no idea but that it might be 50 dollars or so a time, so you can guess I wasn't fooling.)

"Sleep, sleep, you're sleeping so quietly, so peacefully. You are going to sleep." Twice he tried it—fast and slow, persuasive, compelling. Nothing doing.

Once more he came. "Sleep, sleep." (In between he had met Dr B. and told him that I was a very hard case—a fine but hard intellect, and Dr B. has joked me on this hard intellect ever since.)

Sleep, sleep—but sleep slept on, nor would she come at his bidding. Then I suggested I should have some chloroform to quiet the jerks, and that he should try to catch me just as I emerged from the chloroform; I woke clean up. I had taken 15 grains of sodium bromide in the morning, and so I looked up and said: "I was feeling awfully sleepy Doctor, until you came, I think if you had not come I should have gone to sleep." That finished him.

He told Dr B. he was fitting an office in the city with crystal glasses, batteries and so on, and would try me down there. But Dr B. says I scared him; he won't come back.

Now I could fill you sheets more of the funniest happenings: Christian Science visitors; Apostolic Faith; Auto-suggestion; the Presbyterian minister who asked if he could read to me, and started off on 'the fig-tree that was cursed'; the Church of England woman who advised cold cream for the nerves

and said whenever she heard a nonconformist minister pray it sent cold shivers all up and down her spine; the woman who sent me tracts on 'The menace of the movies.' Oh dear, what a life it is!...

Yours ----- .

P.S. I really dare not write a bit tense or emotional, or I shake from head to foot and can't write at all.

You will understand no blame can be attached to my doctor as not one of the hospital doctors or nurses had ever seen or heard anything like it. As to seeing hundreds of people, in the general struggle to say anything at all I forgot to tell XYZ. that I had persevered for a couple of years going to town etc., and seeing people, which is what really made the curvature. So much straining of the muscles. But I was privileged to have an hour of his time and a private examination when he was only a day in — and saw only those at the clinic. This is well on in the seventh year—perhaps the seventh will end it.

CRITICAL NOTICE.

First Report of the Miners' Nystagmus Committee. London: published by His Majesty's Stationery Office. pp. 64. Price 1s. 6d. net.

A survey of the facts collected by the Miners' Nystagmus Committee leaves one in no doubt as to the wisdom of including amongst the members of the Committee some one versed in psychological investigation. The possibility of a psycho-neurotic factor in the disease had been suspected by many observers, and Dr H. W. Eddison was appointed to enquire into this aspect. The desirability of doing so becomes abundantly clear when the data collected from many sources are examined, and the compilers of the Report are to be congratulated upon placing before the public so clear a picture of a widespread and costly industrial disablement.

The facts are remarkable. What is to be considered of such an array as the following? Nearly 1,000,000 men are employed as miners in the United Kingdom. In 1908 the total number of cases of nystagmus was 460; in 1920, 7028. In 1908 the cost of all industrial diseases was £13,000; in 1920, £343,000, ninety per cent. of these sums being due to miners' nystagmus. Yet the number of men employed had risen only from 783,000 to 978,000, whilst it is noteworthy that in the same period the output in tons per man per year fell from 334 to 235. In a typical Yorkshire pit employing 2000 men, 25-38 per cent. (according to the grade of employment) of all men over the age of twenty-one working underground showed oscillation of the eyes, and every one of these men could obtain a certifying surgeon's certificate and be legally disabled. In the north of France, Dransart estimated the frequency as 15 per cent., but 99 per cent. of these were unaware of the condition and were not incapacitated.

The disease varies greatly in different districts and in different pits of the same district. It is more prevalent in the dark winter months, and among the night shift workers. Slack trade causes an immediate increase of cases certified as disabled. When a lump sum is paid in settlement as compensation, the men are more likely to resume work. A man with nystagmus "can always allege that he is unable to work even on the surface, and to ask an employer to prove a man's fitness is simply asking an employer to attempt the impossible." Although every class of worker is affected, 81·5 per cent. of all cases come from the coal face. The direction of the gaze is not an essential factor in the production of the disease. The skilled workmen are the most affected.

It is possible to 'infect' a pit, hitherto free from certified cases of nystagmus, by the introduction of a few bad (nystagmus) cases. Alcohol in large doses lessens and even arrests the oscillations of the eyes, but the prognosis in an alcoholic is not so good as in an ordinary individual. The average age at the time of failure is forty-two. An accident to a man's eye tends to precipitate the disease. There is a tendency for several members of one family to be affected. There is a great difference of opinion as to the influence of a purely ocular condition such as an error of refraction. Compensation has reduced the rate of return to work. A hopeful attitude on the part of the doctor increases the chances of cure. Finally, according to Dr W. H. R. Rivers, "it may now be accepted with confidence that the affection is primarily due to defective illumination."

The recital has a familiar ring to those who have come into contact with the psycho-neuroses produced by the recent war, and it is clear that Rivers' experience therein was of service in dealing with the information obtained by Dr Eddison. A critical examination of the above summary leads inevitably to

the opinion that the study of miners' nystagmus requires a broad view of the worker and his reaction to his environment, and one reads Rivers' personal report with a sense of relief that a beginning has been made, and a feeling of disappointment that the investigation of the psychological aspect has not gone very far. This implies no reproach to the Committee or Dr Eddison. The field for research is enormous; every one of the facts extracted from the Report fills one with wonder as to its significance in the life of the miner. Before speculating on this, it is worth while to see how far the psycho-neurotic miner resembles other sufferers.

After some years of work in the pit, the miner begins to feel eye-strain, followed by a difficulty of concentration of the sight on the object looked at, and a fear of harming, or being harmed by, his fellow workmen. Then follow loss of self confidence, and a fear of light. Such a history can be obtained every day from dozens of out-patients in every ophthalmic department in the country. Unfortunately the out-patients limit their spontaneous complaints to the 'straining.' For reasons unknown to themselves they omit all reference to other symptoms with the sole exception of headache, and, unless the oculist has the perspicacity of Dr Eddison, he is content to attribute the symptoms to the error of refraction which is almost invariably present, and to prescribe glasses. Specialism rarely stops to distinguish between *post hoc* and *propter hoc*.

Following the photophobia come blepharospasm, headache and giddiness. Turning again to ordinary hospital experience, 80 per cent. of ophthalmic out-patients who seek relief from other than inflammatory conditions suffer from headache and 60 per cent. from giddiness. The types still correspond closely. As the miner's disease progresses, disordered action of the heart, excessive sweating and dilated pupils may be noted; corresponding disturbances of the sympathetic nervous system are found among the out-patients. Depression and insomnia and fearful dreams are common in miners; they are also very common in the ordinary run of hospital out-patients.

Taking a broad view of all these facts, the necessity for further psychological investigation becomes apparent. What is the peculiarity associated with the miner's occupation which distinguishes it from practically all others? He is an average kind of man working far down in the bowels of the earth, in very poor light (the illumination of the coal face is sometimes reduced to $\frac{1}{100}$ foot candle), in considerable danger (in 1913 there were 195,000 accidents recorded), and it is found that he tends to become affected with a disease almost as easily as a child becomes afraid of the dark. Increase the illumination and the disease lessens much in the same way as a child's terrors diminish in the comfort and assurance of a night light. Even the fact that he is on a night shift affects him adversely, and like so many nervous children he becomes photophobic. Introduce to the small apparently healthy herd a few bad examples, and a small stampede occurs with startling ease. Encourage the man to give way to his difficulties by granting compensation, and the incidence increases still more. With cheerful confidence encourage the sufferer to get well, and he improves. Diminish the healthy man's sight still further, if only temporarily, by an accident to his eye, and he gets a definite percentage of increase in the risk of becoming nystagmic. Make him forget his troubles by large doses of alcohol, and the nystagmus may disappear, whilst the man who has made it a habit to drown his troubles in drink and failed, cannot be cured. Let him go on working until he begins to get on the down grade in vitality at the age of about forty-two, and he throws in his hand. Bring him back to safety and sunlight, and the sufferer has a reasonable chance of pulling himself together, especially with

the aid of a lump sum settlement, and eventually of trying his luck once more down below. It is the disease of a creature with a mind: pit ponies do not suffer from nystagmus. The higher his mental grade—the more skilled he becomes—the more likely the worker is to be incapacitated. Surely these are not unfair inferences to draw from all the statements in the Report! The psychologist may claim that his department has not been unduly represented in the investigations, and that the disease is worthy of further examination along his own lines, especially when such prominence is given to the dictum by Llewellyn that “the eye has a greater influence on the mind than has any other part of the body.” The opposite view, that is, the expression of mental states by eye symptoms, might be inquired into with advantage to ophthalmic science. To emphasise, for example, the need of a careful refraction of the miner’s eyes, and not to press for further exploration of the miner’s mind, would betray a sad lack of a sense of proportion. The disease should pass from the hands of the oculist. Take away the oscillation of the eyes, and nothing is left but a complex psycho-neurosis which is costing £300,000 in actual disbursement, £1,000,000 directly and indirectly, and an incalculable amount of misery to the miners and their families. What is the remedy? The Report fails lamentably at this point. Beyond recommending better illumination it is practically silent. The environment is to be altered; the man is merely to be cured when damaged. The Manager feels that more insecurity of compensation may have a salutary effect. The Owner is inclined to cut his loss.

The collected data of the actual eye lesions show nothing new, nor are the explanations attached to them impressive. Faithful to the prevailing notion that severe nervous symptoms can follow directly upon the presence of an error of refraction, many observers have sought the solution of the problem of causation in this direction. Thompson, Romée and Nieden lay stress on defects of vision: Snell and Dransart think the factor of no importance. Dransart says 90 per cent. are emmetropic, Norman found error in upwards of 90 per cent. This amazing discrepancy alone is sufficient to make specialism suspect in official quarters. Ohm, who appears to have brought to the study of the subject great breadth of view and a really scientific mind, attached no importance to the factor of refractive error, since the proportion of occurrence is not greater than among the general population. On the other hand, Anderson, the most recent writer on this subject, makes error of refraction the chief factor in the disease. The Report does not show how this is to be harmonised with the fact that it is rare to find a perfectly emmetropic person in the general population, and that in any case every man after his early forties is out of focus by reason of presbyopia. That reliance must not be placed upon any ophthalmic surgeon’s deductions until his personal equation is known is illustrated by the recent statement of a well-known oculist that he had cured a case of ‘shell shock’ by prescribing so weak a lens as 125D cylinder for astigmatism. Equally efficacious has been the hypodermic injection of plain water instead of morphia to bring sleep to the restless. Is it in a similar way that “correction of refractive error gives relief to symptoms although it may not bring about cessation of oscillations”?

Ohm alone of all the observers seems to have thought that heterophoria may be one of the important predisposing factors. He offers no opinion as to the cause of the heterophoria, and so perhaps misses an important clue to the origin of the nystagmus. In this direction the oculist should be able to give invaluable help, and Mr Pooley’s report may throw some light upon it. There is abundant evidence to be got in the ophthalmic departments that heterophoria is associated with a ‘neurotic’ state. Unlike errors of refraction, which

are usually regarded as congenital, heterophoria is acquired and may be found to be directly due to emotional stress in a large proportion of cases. Indeed the influence of emotion on ordinary concomitant squint is so common and profound that it may be suspected as a factor in most cases of disordered muscle balance. Here then, if Ohm is right, may chance to be one of the items of a formula regulating the employment of men in the various occupations in mines.

With regard to the nystagmus, it may well be, as Rivers says, that it plays a part in the production of the psycho-neurotic symptoms. From the evidence adduced, however, such can be only a secondary part. Hundreds of men suffer from nystagmus, without obvious mental symptoms or incapacity. It may be present one day, and obtained only with difficulty the next. In some cases "after prolonged absence from work, well marked neurotic and even hysterical symptoms may appear; in these cases although almost all objective signs have disappeared, the subjective symptoms remain well marked." It is highly probable, therefore, that the nystagmus and the mental symptoms have a common origin, and that the type of patient determines whether the psychical or the physical symptoms shall predominate.

It is surprising that Rivers did not suggest combined psychological investigation and treatment along the lines adopted for the 'shell-shocked' victims of the war. The good results obtained are indisputable, notwithstanding the varying calibre of the medical men engaged therein. As a preliminary measure why not engage half-a-dozen capable psycho-analysts to make an exhaustive examination of the psycho-neurotic symptoms from which the men suffer? The cost of the disease would justify this. The cost per case per year varied in 1920 from £32 in one district to £112 in another. The results of analysis could be collated, and the prospects of cure on a large scale discovered or at least conjectured. The disease might even be prevented by the discovery of a formula showing the likelihood of 'infection' in any particular case, thus allowing suitable men to be apportioned to the various classes of surface and underground work. Judging by the photographs in the Report of several men affected with the disease, the type likely to suffer should not be difficult to recognise even without applying a formula.

A secondary result of a psycho-analytical enquiry into a disease which by common consent is intimately associated with working in light sometimes so bad as to amount practically to darkness would be a gain of information regarding the mentality of the blind or nearly blind. The application of this knowledge to such problems as the education of blind children might prove so beneficial as to make the expense worth while, whatever the effect upon the disease under review.

Since the publication of the Report an important case, described in the Press as being the first of its kind under the Compensation Act, has been tried in the County Court, wherein the widow of a man sued his employers for £300 compensation. The man had been certified as suffering from miners' nystagmus. Previously he had been strong and healthy, but afterwards his interest in life failed, and he drowned himself. The Judge, who was advised by a Medical Assessor, found sufficient relationship between the disease and the manner of death to decide in favour of the applicant.

Both the tragedy and the possibilities following upon this judgment make it still more desirable that the nature of miners' nystagmus should be fully probed, in the interests of the community generally.

W. INMAN.

REVIEWS.

Fundamental Conceptions of Psychoanalysis. By A. A. BRILL, M.D. George Allen and Unwin. pp. vii + 344. Price: 12s. 6d. net.

English readers who are not conversant with the German language owe Dr Brill a debt of gratitude which should, of itself, ensure a friendly reception of any book written by him; for it was through his translation of Freud's earlier writings that such readers acquired their first knowledge of the doctrines of Psycho-Analysis. But good wine needs no bush, and this book can well afford to be judged on its merits, irrespective of any feeling of indebtedness towards its author which on other grounds we may entertain.

It may perhaps be thought that Dr Brill has chosen too big a title for a work which is elementary in its contents and popular rather than technical both in exposition and in appeal. We might have supposed that the fundamental conceptions of psycho-analysis provided a theme which lent itself to a highly technical and formal treatment of the essentials of psycho-analytic theory, and that some critical or expository reference to Freud's more recent speculative hypotheses would have here been forthcoming. But the introduction to the book allays such expectations and disarms such criticism as might legitimately have been made if this work had been addressed primarily to professional students rather than to "those who are occupying themselves with problems of education and psychology."

The material of the book is taken from lectures given by Dr Brill at an elementary course in the department of pedagogics of the New York University. The author has therefore tried to avoid technical expressions as much as possible and has "not taken the trouble to clutter this volume with a lot of references, which a book intended for professional people would necessarily demand." But anyone who knows of Dr Brill's activities realizes that all his work is built on Prof. Freud's foundations and is referred to the work of the master for more detailed and more technical information.

Perhaps no more attractive introduction to the whole subject of psycho-analysis has been written than that contained in Dr Brill's first two chapters. He treats historically the development of psycho-analysis from the "cathartic method" and deals in an illuminating manner with "The Symptom: its Nature and Function." Then follow chapters on "The Psychology of Forgetting"; "Psychopathology of Every-day Life"; "Wit: its Technique and Tendencies"; "The Dream: its Function and Motive"; "Types of Dreams"; "Common Forms of Insanity"; "The Only Child"; "Fairy Tales and Artistic Productions"; "Selections of Vocations."

On all these topics Dr Brill writes with a sure touch and not the least part of the charm of his exposition is due to the wealth of original observations and the appositeness of the illustrations which he brings forward in support of his contentions. A third of the whole volume is devoted to the subject of Dreams, and in this connection the author makes some interesting observations on the production and analysis of artificial dreams, and on the cognate "problem of lying."

The chapters on "The Symptom: its Nature and Function," and on "Common Forms of Insanity" will be specially useful to non-professional

readers, for Dr Brill's psychiatric training leads him to present the findings of psycho-analysis in a broader way than is common to writers who have in mind chiefly those morbid states in which psycho-analytic treatment is most useful, namely, the transference neuroses; and thus the reader is enabled to envisage in a truer perspective the bearings of psycho-analytic theory on all the problems of normal and abnormal mental life.

The chapters on "The Only Child" and "Selections of Vocations" will be helpful to those whose chief desire is to know the practical applications of psycho-analytic teaching. A widespread knowledge of the difficulties in adjustment to life which beset the pathway of the only child, and a clear realization of the folly of attempting to choose for another human being the vocation which he or she should follow, may have profound effects on the health and happiness of future generations.

If we try to discover from Dr Brill's book what the fundamental conceptions of psycho-analysis really are, we may be inclined to reduce them to two: (1) all behaviour is based upon unconscious mentation, and (2) all unconscious mentation is motivated by the wish. These two conceptions come to light in the examination of all those forms of mental and bodily activity which are considered in this book: the symptom, forgetting, the slips and blunders of every-day life, wit, dreams, fairy-tales and artistic productions; and, indeed, they may perhaps be truly regarded as the most fundamental conceptions of psycho-analytic theory.

T. W. M.

Sex Problems in Women. By A. C. MAGIAN, M.D. London: William Heinemann (Medical Books), Ltd, 1922. pp. 219. Price: 12s. 6d.

This book is a series of discursive essays on various aspects of feminine sexuality. The title is misleading as no problems are either formulated or discussed. The book is actually, as the author himself states in the Preface, a compilation from standard works. No original contributions are made to the subject, and the evidence which professional experience has brought the writer is most sparingly adduced. The promise of the introductory chapter, that an attempt will be made to elucidate various problems such as "why a woman should cherish a love-passion for the man who ill-treats and abuses her, etc." (p. 1), is not fulfilled. It can hardly be held that the inference that a woman loves her cruel husband because cruelty causes her sexual satisfaction, affords any explanation of, or insight into, the problem of sex for that type of woman, but no other elucidation is forthcoming. This example is characteristic of how the subject-matter is treated throughout. Some of the ethnological statements succeed in conveying false impressions; thus the 'rite' is transformed into the 'right' of defloration (p. 46). Again, the sacred prostitution practised in Babylon is referred to as a 'penance' (p. 140), whereas it was a propitiatory sacrifice to ensure easy child-birth and general fertility. Some points of treatment seem open to criticism such as the use of local irritants as a cure for masturbation (p. 100), or of marriage for mild cases of nymphomania (p. 76). It is interesting, too, to find valerian still considered an active therapeutic agent. Though abnormal sexual conditions and impulses are acknowledged to be "the active agents in the production of the most diverse forms of mental disease and neurasthenia" (p. 1) the references to psycho-therapy are of the most meagre. To the psycho-pathologist this book can be of no service.

As a whole this is a readable, fair-minded, superficial presentation of well-recognized facts, but it is no more if it is no less. It is, however, baffling to understand why the author should consider that 30 pages of anatomy and physiology—surely unnecessary for the medical readers to whom the book is explicitly addressed—"place the matter on a scientific basis."

JANE I. SUTTIE.

The Psychology of Misconduct, Vice and Crime. By BERNARD HOLLANDER, M.D.
George Allen and Unwin, Ltd. pp. 220. Price: 7s. 6d. net.

This book contains the author's reflections on his experiences of moral derangement in the course of 25 years' practice as a physician specializing in nervous and mental disorders. We are told in the Preface that "it is written from the standpoint of the 'new psychology,'" but it is difficult to find any justification for this statement. There are so many 'new psychologies' nowadays that we may well be in doubt as to what particular brand is favoured by any writer who is enamoured of this term. Ordinarily, its use implies some reference to the changes introduced into the study of the mind by the work of the psychoanalysts and we are naturally led to expect that any book "written from the standpoint of the 'new psychology'" will show at least some understanding of, if not sympathy with, psycho-analytic theory and practice. It is evident, however, that Dr Hollander does not use 'new psychology' in this sense. It is true that he uses words such as 'repression' and 'sublimation' and insists that "mental analysis can, and should be practised by every medical psychologist"; but although he sometimes uses the terms of psycho-analysis, the concepts to which he applies them belong to an older psychology. "The voice is Jacob's voice, but the hands are the hands of Esau."

Starting from the fact that "there are a number of elementary instincts and feelings which we possess in common with animals," the author tells us that "these instincts in man do not act blindly as in animals. They are reduced in him to obscure impulses which urge him in certain directions, but leave him to choose the itinerary of his course. Instincts, in man, therefore, are sometimes spoken of as *propensities*."

The various forms of misconduct are described and correlated with the propensities to which they are due. Drink and drug habits are the result of the propensity to eat and drink; aggressiveness, ill-temper and violence are the outcome of the combative propensity; morbid suspicion, cunning, and deceitfulness arise from suspicion, which is "a protective propensity and hence a necessary quality"; theft is due to the propensity to acquire and hoard; sexual crime is due to "the sexual propensity." On all of these topics the author writes in an easy, popular, style and conveys a considerable amount of information which may prove interesting and instructive to the non-professional reader; but the student will find here hardly any reference to what at the present day we understand by the psychology of misconduct, vice and crime.

Throughout the book an inordinate importance is ascribed to the part played by the intellect in the determination of conduct. Thus we read: "The greater the intellect of a man the greater the check upon his motives and passions" (p. 22). Again we are told that some people "though endowed with considerable intellect, still have not enough of it to resist their propensities" (p. 29). "The better furnished his intellect, the greater the check on his actions" (p. 179); "it is the highly developed intellect of a man which changes the innate

animal propensities into glorious faculties" (p. 169). Another and a different set of values seems implicit in the following quotation: "a lack of ethical feeling is often an advantage. Some of our most successful public men would not be in the position they now occupy if they were too tender-hearted. On the other hand, a lack of intellect is always a drawback" (p. 162).

The last chapter is devoted to the treatment of moral failings. Stress is laid upon the physical basis of many moral defects and the importance of physical treatment in such cases is pointed out. On the psycho-therapeutic side Dr Hollander advocates suggestion, mental analysis and re-education. He considers psycho-analytic treatment to be a risky procedure for the physician (because of transference) and dangerous to the patient if undertaken by a layman. His attitude towards psycho-analysis may be judged from his comments on the following passage which he quotes from Stekel; "women who have not the courage to commit a sin against morality will steal some article which is of no value to them, as the symbolic fulfilment of a forbidden action, whereby the symbolic significance of the stolen article very often reveals the true nature of the instinctive action." Dr Hollander says: "We may well defer our opinion on this explanation until a psycho-analyst of the ultra-Freudian kind, who sees 'sex' in every abnormality, will give evidence in defence of a lady kleptomaniac. We shall then hear what the judge will have to say on the defence that the article stolen symbolically gratified the lady's sexual longings" (p. 199). A strange ground, truly, on which to base a scientific judgment!

T. W. M.

Studies in Psychoanalysis. By CHARLES BAUDOUIN. Translated by E. and C. PAUL. London: George Allen and Unwin, Ltd., 1922. pp. 326.

"Monsieur Baudouin is already well known to the English public as the author of *Suggestion and Autosuggestion*, in which he acted as the evangelist of Coué. His new book *Studies in Psychoanalysis* is put forward as an attempt to show that the method of suggestion as set forth in his previous treatise may advantageously be combined with psychoanalysis, in the treatment of nervous disorders. He claims to have found from his personal experience that "a great deal of time and trouble is saved by the use of suggestion in conjunction with psychoanalysis."

Baudouin, however, is careful to point out that there is suggestion and suggestion, and while certain forms are incompatible with analysis others are commendable adjuvants. Thus the suggestion which increases repression is to be avoided. The latter he terms the 'vade retro' method of dealing with a symptom and recognises that it cuts off the shoots without touching the root of the evil; it is the 'ça passe' exorcism of Coué. The other form, what we might call positive suggestion, is termed by Baudouin the 'Veni Creator' method; it corresponds to Coué's formula "day by day in every way I get better and better." It is to this form of suggestion that Baudouin looks for help. He applies it to the overcoming of resistance, and to the guidance of the patient both during and after a course of analytical treatment. Though this is the gist of Baudouin's thesis he has a great deal more to discuss and many will find other of his points of greater value. The book is divided into two sections; the first, a theoretical exposition, occupies rather less than one-third of the volume. The second contains case histories of twenty-seven patients. The case histories

are clearly written and show as admirably as an elementary presentation well could a selection of common neurotic dispositions and how these are illuminated by psychoanalysis. They do not, however, give us any inkling as to how the author applies his method. One learns from them nothing of that unceasing collaboration between autosuggestion and psychoanalysis which is assigned as the *raison d'être* of their publication. The reviewer also failed to gain any more precise information than is given in Part I when visiting the Jean Jacques Rousseau Institute, attending the clinic there and conversing with Monsieur Baudouin early this year (1922).

In Part I Baudouin defines his aim as the production of a record of his own work which might interest experts, not the writing of a popular treatise for beginners. Yet he admits that the French as a nation are most backward in psychoanalytical knowledge and therefore feels it incumbent upon him to deal with general principles as most of his readers are in fact beginners. For this we may well be grateful since it has induced Baudouin to give us what is a most stimulating and suggestive discussion on several points. He tritely remarks that however tolerant and kindly psychoanalysts may be to their patients they seem to take a positive delight not only in violently upsetting the smug prejudices of the world in general, but also in clothing their theories in obscure neologisms. Certainly Baudouin himself is free from this reproach, for though he never lacks courage his statements are put forward with no less delicacy than force. After commending Victor Hugo for his frankness in the poem "Boaz endormi" he remarks "I find the idea that all poetry, all glory, all holiness have this (instinctive) lowly origin no more offensive than I find Darwin's idea (now generally admitted) of the descent of man."

Therefore, although addressed to so-called experts, Baudouin's book will fill a useful rôle in introducing some of the conclusions arrived at by analytical methods to the more intelligent of the laity without giving them an unnecessary mental dyspepsia. Baudouin's treatment of condensation and displacement in particular is stimulating. He regards symbolism as the natural outcome of the interaction of the laws of condensation and displacement, yet he finds the concept of the censor one of the most valuable contributions of Freudian psychology. Once these mechanisms exist they are at the disposal of the censor for disguisement and may have yet other functions. Freud himself has said "that which is to-day linked under the form of the symbol presumably constituted at the outset a conceptual and verbal unity." Once we agree that the dream is a regression to an archaic mode of thought we may anticipate disguise even though disguise is not purposive. Again the mechanism has a further utility in that it is the essence of creative imagination. For just as intelligence ensures our adaptation to the real so does imagination ensure the adaptation of the real to ourselves.

Baudouin would agree with Claparède in assuming for dreaming the same function as has Groos for play, namely, the exercise of certain activities which have a prospective value to the individual. Thus though Baudouin is sympathetic to Freudian psychology he seeks to discover a wider basis and utility for certain mechanisms.

This he expresses poetically by likening the dream to an orchestra in which a number of instruments are playing. The ear can, at will, follow the notes of one instrument or another, and various interpretations are possible. Only we must never lose sight of the plurality of meaning, never cease to attend to the orchestra as a whole.

The crux of Baudouin's thesis is the transference. He considers that psychoanalysts by admitting the transference have adopted suggestion willy-nilly and that they would be wise to recognise this and attempt to guide their suggestions. That the transference is the meeting place of psychoanalysis and suggestion has long been recognised and the whole question has been rather fully treated by Dr Ernest Jones (*vide* his *Collected Papers*) and others. It is therefore not necessary to enter into this matter here nor to confute the statement that transference itself takes the form that is imposed upon it by suggestion. In the course of his general exposition Baudouin briefly appraises the value of the tendencies of Adler and Jung. The attempted synthesis of the latter he regards as philosophical rather than scientific. He considers that the time for synthesis has not yet arrived, rather is further analysis first required. Each instinct requires to be studied separately and the utmost done to trace all its possible metamorphoses in the human psyche. This offers an interesting perspective to investigators and if it is undertaken we may expect a series of monographs upon the different instincts. Already we have Trotter's study of the herd instinct and Pierre Bovet's account of the combative instinct. Each instinct will, in Baudouin's opinion, be found to undergo a religious sublimation and he is interested to trace the history of their avatars. A general synthesis should only be undertaken as the crowning result of such researches. Looking at things in this light Baudouin may be said to view Adler's work as a monograph upon the *Ichtriebe* of Freud, while he tends to regard Freud's work as too exclusively concerned with the *Sexualtriebe*. In a footnote he says it is amusing to note that the names of these two men of science are symbolical of their respective theories: for *Freude* signifies joy (the pleasure principle), while *Adler* signifies eagle (will to power). Whatever our view may be there is no occasion for pessimism. All instincts have a rightful place in our make-up; the neuropath is out of harmony with the real only because he has become obsessed by one principle only. Fortunately, the other instincts are, like sexuality, capable of undergoing sublimation. On the whole Baudouin's outlook is sympathetic towards psychoanalysis, indeed he seems to fear that he may be accused of being a pan-sexualist. Possibly this attitude is influenced by what he knows of the readers to whom his work is addressed, yet his constant endeavour to weaken the sexual motive appears also as the expression of a personal need. The book, however, forms interesting reading and indicates the path along which the Latin mind is groping towards an understanding of psychoanalysis. There is a useful glossary and an adequate index.

ALFRED CARVER.

The Psychology of the Criminal. By H. HAMBLIN SMITH, M.A., M.D. London: Methuen & Co. Ltd. pp. 182. Price 6s. net.

This book is a valuable contribution to clinical psychology and may be recommended to all who are interested in social science as well as to professional students of Law and Medicine. It is an attempt to apply to the study of the criminal the new conceptions introduced into psychology by Freud and his followers, and the author's main contention is that the intensive investigation of individual offenders in the light of psycho-analytical theory is the road to the solution of the problem of criminality.

According to Dr Hamblin Smith "crimes are, from the legal point of view,

acts which, in the opinion of a particular society, at a particular time, are considered to deserve punishment by that society...a crime is an act which is legally wrong, and which is, essentially, an infringement of the criminal law. The question as to whether the act is 'morally' wrong does not come in" (p. 2).

A review of the various theories of punishment leads the author to a consideration of the thorny problem of responsibility. He avows himself to be a thorough-going determinist and declares that "the metaphysical theory of the 'freedom of the will'" has no place in any scientific scheme. He rejects the idea that responsibility is something intrinsic to the individual, but regards it rather "as expressing the idea of the reaction of Society to a given act" (p. 10).

In what he says regarding the relation of Society to the criminal, Dr Hamblin Smith illustrates the difficulty, if not the impossibility, of trying to adhere to strictly deterministic terminology when dealing with the facts of human conduct. He says: "If Society chooses to decide that under special circumstances its normal reaction to some act will be modified, it is, of course, at complete liberty to do so" (p. 10). Yet, surely, to claim liberty of choice when we are speaking of the reactions of Society is even less defensible than when the reactions of the individual are in question. It would perhaps be well if it were more generally recognized that 'determinism' is just as much a metaphysical theory as the 'freedom of the will' and that with metaphysical theories the scientist *quâ* scientist has no concern. Determinism is a postulate of all scientific inquiry, and whenever we doubt the validity of its application to any problem we are doubting the possibility of solving such problem by the methods of science.

The various theories of punishment that have, at one time or another, been put forward are here reduced to three: Retaliatory, Deterrent and Reformatory. The author believes that the comparatively unsuccessful result of reformatory punishment has been due to a failure to investigate fully the mind of the individual offender; and in such full investigation he sees the hope of the future.

Inquiry into the mental states of offenders is a very specialized matter, and this book contains Dr Hamblin Smith's experience in this direction. He hopes that his work may be of practical use to his fellow-workers who are engaged in the study of offenders, to magistrates and others whose daily work lies with offenders, and to social workers, teachers in schools and others.

The author insists on the importance of a complete physical examination of the offender before the investigation of his mental state is entered upon; but he does not labour this point and the greater part of the book is devoted to the methods employed in the investigation of the offender's mind. A broad division is made between the examination of the conscious mind and of the unconscious mind, and the methods employed in each respectively are described in some detail.

Not the least valuable part of the book is the description given of the mental tests used by the author himself in his examination of criminals. He believes the Binet and Terman schemes to be useful for work in Children's Courts, but in his own Court work he has to deal with no children under the age of 16 years and with comparatively few offenders between the ages of 16 and 18 years. He has therefore devised a series of tests, suitable for adolescents and adults, and he invites reports from any workers who give a trial to this scheme.

In entering upon his account of the investigation of the offender's unconscious mind the author prepares his readers for the standpoint from which the topic is viewed by stating at the outset that "this book is written, so far as

the subject of psycho-analysis is concerned, from the Freudian position." He makes it plain that, as a rule, modifications of Freud's views promulgated by others are regarded as resting upon "a fundamental and irreconcilable difference from the views of Freud." Yet on some points there is evidence that he has not been uninfluenced by some of these innovations. His description of what we are to understand by the terms conscious, preconscious and unconscious is not as clear as we should have desired; and a predilection for the term complex, which is unfortunate in the present state of uncertainty regarding the most appropriate use of this word in psychology, leads to a blurring of some of the finer points related to the theory of repression and to the elements on which repression essentially bears.

On page 70 it is stated that "a complex may become repressed into the unconscious. The unconscious into which this repression takes place is regarded as being, in some respects, distinct from the primary unconscious.... It has been termed the 'secondary' or 'Freudian unconscious.'" We should have been glad of the reference to Freud's works where this distinction is made. It is reminiscent of Tansley rather than of Freud.

On page 73 we are told that "A repressed complex may escape into consciousness by taking the form of a physical symptom. In this case we get what is known as a 'neurosis' or a 'psycho-neurosis.'" This is, to say the least, misleading, and the layman may be led to suppose that in every psycho-neurosis there must be physical symptoms.

The brief reference to 'symbolism' on page 74 seems to the reviewer far from satisfactory. The disguise afforded by symbolism is here ascribed to the censorship; and to evade this activity it is said that "emotions, thoughts and memories strive to get into consciousness by clothing themselves in symbolic shapes." But this is not Freud's teaching; he explicitly states that symbolism is "a second and independent factor in dream-distortion, existing side by side with the censorship" (Introductory Lectures, p. 142).

Dr Hamblin Smith's chapter on "The Various Classes of Offenders" is very helpful and suggestive, especially in regard to the group of mental defectives. Recognizing the serious and far-reaching results of certifying a person as being mentally defective, he inclines towards giving the offender the benefit of the doubt whenever such doubt arises in the examiner's mind. He strikes a necessary note of warning of the danger of deciding on the results of mental tests alone. He does not believe that the mere failure to attain any particular standard of 'mental age' is, *per se*, enough to bring a person under the heading of mental deficiency. In every doubtful case we have to weigh all the factors and not that of intelligence alone.

But this relegation of the intellect to its proper place in relation to conduct appears to be forgotten by the author when he comes to deal with Moral Insanity and Moral Imbecility. He asks the question, "Is there such a thing as a 'moral sense,' apart from the intellect?" And he states his view that there is no such sense. He thinks that the doctrine of psychical determinism, to which he repeatedly avows his allegiance, renders any such position untenable.

If, as would seem to be the case, Dr Hamblin Smith is using the term 'moral sense' as it was used by the English Moralists of the eighteenth century, then it may be conceded that few at the present day would disagree with his conviction that 'there is no such sense.' But if he implies that there are no forces in the mind which are determinants of conduct other than those derived from the intellect, then there are good grounds for disagreeing with his con-

clusions. Indeed, such a view is totally opposed to the findings of psychoanalysis (quite apart from all other considerations that may be put forward), for no other psychological discipline has more strongly emphasised the importance of affective factors, and the relative unimportance of purely cognitive or intellectual ones, in the conduct of life. Moral judgment is a function of intelligence only in so far as it is a process of classifying acts as 'right' or 'wrong,' but moral judgments to be effective in conduct must be prompted by the emotions and based upon the sentiments. It may be true that all moral imbeciles are primarily abnormal intellectually, but this does not carry with it the proof that their moral imbecility is the direct consequence of their abnormal intellect. There may be a concomitant faulty development of the emotional life and an absence of the 'moral sentiments,' and it may be these rather than the intellectual defect which determine the moral imbecility.

In his final chapter Dr Hamblin Smith is chiefly concerned with the reaction of Society towards crime. It is not necessary, he says, that the reaction of Society should for ever take the form known as 'punishment,' and he declares that "this book will have been written in vain if the author has not impressed upon his readers this one moral— not punishment but treatment." Throughout his work he maintains the scientific attitude towards the offender which psychoanalysis requires from those who practise it in the treatment of the neurotic patient: not praise or blame but dispassionate inquiry into the contents of the unconscious. Just as only by finding out where the libido development has gone astray can we solve the problem of neurotic illness, so "to find out why a man does wrong is the only true solution of the problem of delinquency."

The study of individual offenders will reveal to Society its own shortcomings and thus provide an opportunity for reform, for "faulty reaction on the part of an individual to Society may mean that Society has handled him incorrectly." Thus, in Dr Hamblin Smith's opinion, "the study of the offender leads not to despair, but to an enlightened optimism." He believes that the day has come for a re-examination of our penal system and of its bases, in the light of our newer and fuller scientific knowledge and in the hope that we might devise something better."

However this may be we can heartily recommend this book as a propaedeutic to all who have the reformer's spirit towards the many problems provided by the relations of Society and the criminal.

T. W. M.

Psychoanalysis and the Drama. By SMITH ELY JELLIFFE and LOUISE BRINK, A.B. Nervous and Mental Diseases Monograph Series, No. 34. Washington, D.C. 1922. \$3.00.

There is little to recommend the publication of these papers in the form of a book. It is a collection of ten essays of quite unequal merit, mostly reprints from medical journals, which lose by being brought into juxtaposition. No doubt the few valuable ideas, which are presented over and over again, in relation to different plays and different problems, are impressed by this means on readers to whom they are new.

The first paper originally bore the title "The Physician and Psychotherapy." It stresses the idea that the drama, because it deals with deep human problems, is very helpful to psychological understanding, and further of course, that Psychoanalysis is helpful to a deeper understanding of the drama. The writers

deplore that the ordinary physician knows so little of psychology, and recommends attendance at the theatre as a means of enlightenment upon the obscure problems of the soul.

Not only is the drama recommended for physicians but also for patients. "The hours at the theatre should greatly relieve the strain of repression and... furnish food for thoughtful speculation." It is difficult to see how the drama, *per se*, which is almost as old as man, and in which it is not easy to discover a "*growing* intellectual and artistic value" can teach man more than it has ever taught him. In the fourth century B.C. Aristotle spoke of Tragedy as a "catharsis through pity and fear." Again, if Sophocles could not of old time impress upon man the importance of his problem not only with the gods, but with the mother, will the drama of to-day do it more effectually? Is not the expectation that insight will arise from attendance at the theatre a putting of the cart before the horse? Much of the enjoyment experienced at the theatre is the satisfaction that comes from unconscious identification, an automatic process of doubtful psychological value. Undoubtedly pleasure, especially pleasure from the drama, ministers to our well-being; but in the technical sense it cannot remove repression, and the removal of strain is merely through distraction from the problems which press for understanding and solution. While not denying a therapeutic value to the theatre, it is strange that analysts should be at pains to impress these reasons upon the profession and the public, who already avail themselves of them. What psychoanalysis has pointed out is why such tactics generally fail of their aim, and that what is essential is not distraction but analysis. It is a question of making the unconscious conflict conscious to the individual concerned, and it would seem as if the writers consider this a probable or possible result.

The reviewer contends that a person who is unawakened to unconscious processes in life will be very unlikely to detect them in the drama; that physicians will not learn psychology from it if they have not begun to learn it outside the theatre; and that the theatre is no place for our patients to study psychological pathology. Any insight shown in the discussion of the plays enumerated in the book before us comes from a self-conscious study of personality which is derived not from the drama, but from psychoanalysis.

CONSTANCE E. LONG.

NOTES ON RECENT PERIODICALS.

Internationale Zeitschrift für Psycho-Analyse, Vol. VIII, part I, 1922.

Dr Imre Hermann contributes an article entitled "Marginal notes on the compulsion to repetition." The compulsion to repetition, a conception first elaborated by Freud in *Jenseits des Lustprinzips* (1920), is treated by Dr Hermann in the following aspects:

- (1) its 'meaning' in the mental structure;
- (2) its relation to the pleasure principle;
- (3) the 'manner' of the repetition.

(1) In order to find the 'hidden meaning' of a mental phenomenon, we ask ourselves the questions: "Whence is it derived?" "What purpose does it serve?" That is to say, that the objective criteria of 'meaning' in such a phenomenon, e.g. a dream or a symptom, are the representation or reproduction of a former situation and the serving of a purpose. Now repetition and purpose secure the continuity of the single psychic individual (personality), and the most primitive method of securing this continuity is that of the compulsory repetition of previous situations. In order that this principle of continuity may be preserved in the case of the instincts with their purposive, yet irrational, character, Freud conceives of the instinct as a force within the living organism, urging it to reproduce an earlier state. This necessitates the extension of the idea of continuity from the individual to the race, and upon this phylogenetic continuity (typical symbols) depends such correctness of interpretation as is possible in the analysis, by means of the subject's own free associations, of the products of other minds.

(2) It is in relation to pleasure-pain as elements of consciousness that the writer considers the compulsion to repetition. According to the Breuer-Freud theory, the question is one of the increase or decrease of excitation in the perceptual (W.; Bw.) and object-memory (Er.) systems. The effect, painful or otherwise, is discussed of simultaneous and repeated stimuli; in the case of the latter the effect varies with the intervals between the repetitions.

(3) Dr Hermann shows that the compulsion to repetition which, as belonging to the primary process, has no regard to time or place, encounters a function of the pre-conscious system belonging to the secondary process, a function which he terms 'Ordinanz' (will to order). In both the race and the individual, 'Ordinanz' develops in the service of the reality principle and would appear to be connected with morality, being conspicuously lacking in morally defective children. He suggests that light may be thrown on this connection by a study of pathological manifestations of the primitive compulsion to repetition (faulty development, regression, morbid attraction of anal and urethral erotism).

Dr S. Feldmann's article "On Blushing" is a contribution to the psychology of shame. The first part of the paper is an account of the analysis of a young man, whom he treated for this symptom of blushing, and shows how it was successively found to be related to the patient's 'beauty-complex,' to exhibitionism with urethral erotism, and finally, to the castration-complex, accompanied in this case with repressed homosexual tendencies. Certain significant points emerged in the analysis: the symptom tended to be less troublesome or to disappear, when the patient practised onanism; when this was discontinued, the symptom again became acute. The nose was to him an erotogenous zone; moreover, he endeavoured to motivate his blushing, of which he was painfully conscious, by rubbing and vigorously blowing his nose. From dreams and other evidence it was clear that, by the mechanism of displacement, the face (nose) was standing for the genitals (penis). Deeper analysis revealed at the bottom of all the castration-complex. The patient suffered from a sense of inferiority in respect of the size of his penis and from a dread of castration. Dr Feldmann be-

lieves that self-confidence "crystallises itself around the penis" and that "social shame" arises from feelings of inferiority in connection with that organ.

In the second part of the paper, he discusses certain observations of Darwin, Gerson, Havelock Ellis and others on the phenomenon of blushing and concludes that the mechanism of blushing is similar to that of conversion hysteria, that it manifests itself like a compulsion neurosis and that it is an autoerotic libidinal function of the skin. Freud has shown that one of the sources of self-confidence is the remnant of childish narcissism, and this primary narcissism is intimately connected with intactness of the genital organs. In the Unconscious the ego may be identified with the penis (in dreams, folk-lore, etc.). We know also from Ferenczi that there is a universal identification of the ego with the face. Thus blushing (= erection) is a compensation for the injury to self-confidence.

Dr Paul Schilder (Vienna) gives a detailed account of a psychosis following on an operation for cataract. The patient was a woman of fifty-three, whose naturally timid and nervous disposition was accentuated by the disturbance of her sight. Two days after a successful operation for cataract, she became greatly excited and suffered from visual and auditory hallucinations. As time went on, her delusions took two principal forms: that those around her were about to murder or mutilate her, and that birds or beasts were in the room or the bed, attacking her or soiling the bed-clothes, etc. These terrors continued for seven weeks, after which a hypomanic condition set in but gradually abated and finally disappeared. Dr Schilder shows that the operation upon the eye (a frequent symbolic representative of the genitals) roused the patient's castration-complex, which he believes to play an important part in post-operative psychoses. Further, he is of opinion that the resolution of a complex may lead to hypomanic states, as in the case of this patient, a view which he has elsewhere put forward. ("Preliminary studies for a psychology of Mania," *Zeitschrift f. d. ges. Neur. u. Psych.*, 68, 1921.)

In a paper on the psycho-analysis of a case of homosexuality, Dr M. Nachmansohn (Königsberg, Pr.) traces the influence of the innate and the acquired factors in a severe case, the analysis of which (lasting in all over 2½ years) was conducted in three separate periods, in which it went through three distinct phases. In the first phase, the development of the perversion was traced, its innate character being given special prominence. In the second phase, the incest-complex was revealed as the root of the disease and manifested itself with great force. In the third phase, by means of 'active' therapy, the completion of the cure was effected.

Besides these original articles, this number of the *Zeitschrift* contains the following communications:

"The Oedipus-dream of a schizophrenic," by Dr Arnold Stocker.

"Father-rescue and father-murder in neurotic phantasies," by Dr Karl Abraham.

"Bridge symbolism and the Don Juan legend," by Dr S. Ferenczi.

CECIL M. BAINES

EDITORIAL.

THIS Journal will appear henceforth under the title of *The British Journal of Medical Psychology*. The change of name has been forced upon us by various circumstances. The old title has been found too cumbersome for purposes of reference, and a failure by authors to distinguish clearly between the *General Section* and the *Medical Section* of *The British Journal of Psychology* has sometimes led to doubt in the minds of their readers concerning the place where certain contributions to our pages may be found. It has further proved difficult to convince some publishers that the *General Section* and the *Medical Section* of the *Journal* are two separate publications and these publishers have consequently been reluctant to send two copies of a book for review to what they considered to be one journal. It has been and will continue to be our custom to review in the *Medical Section* many books which are noticed, from a different standpoint, in the *General Section* of this *Journal*; and it is hoped that the change of title of the *Medical Section* will obviate the need for repeated assurance to publishers and others that the *General Section* and the *Medical Section* of *The British Journal of Psychology*, although both organs of the British Psychological Society, are nevertheless two entirely separate and independent publications.

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